

EXHIBIT

P

1 CAUSE NO. 2012-CI-18690

2

3 JENNIFER RAMIREZ F/K/A) IN THE DISTRICT COURT

4 JENNIFER GALINDO,)

5 Plaintiff,)

6 v.) 438th JUDICIAL DISTRICT

7 CESAR REYES, M.D.,)

8 JOHNSON & JOHNSON,)

9 AND ETHICON, INC.,)

10 Defendant.) BEXAR COUNTY, TEXAS

11 -----)

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14 --- This is the Videotaped Deposition of VLADIMIR
15 IAKOVLEV, M.D., taken at the Hilton Hotel,
16 University Room, 145 Richmond Street West,
17 Toronto, Ontario, on the 19th day of April, 2016.

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21 REPORTED BY: HELEN MARTINEAU

22 CERTIFIED SHORTHAND REPORTER

23

24 VIDEOGRAPHER: DAVID LANE

1 A P P E A R A N C E S:

2 FOR THE PLAINTIFF AND THE WITNESS:

3 ANDERSON LAW OFFICE , LLC

4 BENJAMIN H. ANDERSON, ESQ.

5 1360 West 9th Street, Suite 215

6 Cleveland, Ohio 44113

7 Tel. 216.589.0256

8 Email: ben@andersonlawoffices.net

9

10 FOR THE PLAINTIFF AND THE WITNESS:

11 FREESE AND GOSS

12 RICH FREESE, ESQ.

13 1901 6th Avenue North, Suite 3120

14 Birmingham, AL 35203

15 Tel. 205.871.4144

16 Email: rich@freeseandgoss.com

17

18 FOR THE DEFENDANT:

19 BUTLER SNOW, LLP

20 CHAD R. HUTCHINSON, ESQ.

21 1020 Highland Colony Parkway, Suite 1400

22 Ridgeland, MS 39157

23 Tel. 601.985.4401

24 Email: Chad.hutchinson@butlersnow.com

1 A P P E A R A N C E S: (continued)

2 FOR THE DEFENDANT REYES:

3 SCOTT, CLAWATER & HOUSTON, L.L.P.

4 CAROL Y. VERBEEK, ESQ. (via Skype call)

5 2727 Allen Parkway, Suite 500

6 Houston, TX 77019

7 Tel. 713.650.6600

8 Email: cverbeek@schlawyers.com

9

10 FOR THE DEFENDANT:

11 THOMAS COMBS & SPANN, PLLC

12 PHILIP J. COMBS, ESQ.

13 300 Summers Street, Suite 1380

14 Charleston, WV 25301

15 Tel. 304.414.1805

16 Email: pcombs@tcspllc.com

17

18

19

20

21

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1 --- Upon commencing at 9:15 a.m.

2 THE VIDEOGRAPHER: My name is David Lane

3 I'm the videographer for Golkow Technologies.

4 Today's date is April 19th, 2016. Our time is

5 9:15 a.m. This deposition is taking place in

6 Toronto, Ontario, in the matter of Jennifer

7 Ramirez versus Ethicon Inc. et al. Our deponent

8 today is Dr. Vladimir Iakovlev, MD. Our deponent

9 -- counsel will be noted on the stenographic

10 record. Our court reporter today is Helen

11 Martineau. Would the court reporter please swear

12 in the witness.

13 (WHEREUPON, the witness was duly affirmed.)

14 VLADIMIR IAKOVLEV, M.D.,

15 called as a witness herein,

16 having been first duly sworn,

17 was examined and testified as follows:

18 DIRECT EXAMINATION BY MR. ANDERSON:

19 Q. Good morning.

20 A. Good morning.

21 Q. What is your name?

22 A. Vladimir Iakovlev.

23 Q. What is your occupation?

24 A. I'm a doctor and I'm a pathologist.

1 Q. What is pathology?

2 A. Pathology is part of medicine is
3 laboratory medicine. Pathologists are doctors who
4 work in the lab in the hospital. We receive
5 samples from the patients the samples are taken by
6 the treating doctors. Samples would be fluids
7 like blood and urine, or tissue samples like
8 biopsies from tumors or larger organs resected
9 from the body. We analyze them, we cannot do all
10 possible tests so we do only those tests which are
11 needed to manage the patient immediately. We
12 report these results to the commissions or to
13 treating doctors and they treat the patients.

14 Q. Do you have a particular focus
15 within pathology?

16 A. I am an anatomical pathologist.

17 Q. And what is an anatomical
18 pathologist?

19 A. Anatomical pathology is part of
20 pathology where laboratory doctors examine tissue
21 samples not fluids like blood but tissue sample,
22 scrapings of cells like pap smears, or biopsy from
23 tumors like a core biopsy from a breast lump, or
24 larger resections like part of bowel or lump from

1 the breast, or sometimes we examine the entire
2 body. We do an autopsy. You probably have seen
3 autopsies on TV.

4 Q. You said the word "resection", what
5 is a resection?

6 A. Resection is when a part of the
7 organ is cut-out. Resected means cut out. It can
8 be an organ or it can be a part of device like a
9 mesh.

10 Q. Are you familiar with a term in
11 medicine known as "differential diagnosis"?

12 A. Yes, I am.

13 Q. Is that something that you as an
14 anatomical pathologist use in your daily practice?

15 A. Yes, I do.

16 Q. Can you please explain for the jury
17 what a differential diagnosis is?

18 A. A differential diagnosis is a list
19 of possible diseases which can cause similar
20 symptoms. When the patient comes in they report
21 specific symptoms so the treating doctor has a
22 list of possible diseases which can cause the
23 symptoms. They take the history, they examine the
24 patient then they narrow down that list to smaller

1 number. But then at certain point they need our
2 help. So they take samples like blood or the
3 tissue samples and send it to the laboratory. And
4 then laboratory doctors like me examine these
5 specimens and we work down the pathological part
6 of the differential diagnosis. We narrow down
7 that list to one disease which caused the
8 symptoms.

9 Q. So is the differential diagnosis
10 that you perform as a pathologist the same or
11 different as a differential diagnosis by patient's
12 treating doctor or clinician?

13 A. It's the same and it's different.

14 Q. Okay. Please explain?

15 A. It's a part of the larger
16 differential diagnosis because treating doctors
17 can narrow it down to a certain point but they
18 still need our help otherwise we wouldn't be
19 needed in the hospital, we wouldn't have a job.
20 But at certain point they have to take biopsies
21 and send it to us and then we can do our
22 pathological differential diagnosis or we can rule
23 out diseases which can be ruled out only by using
24 a microscope not by just examining the patient.

1 Q. And is this the process that you've
2 described that you do every day in your daily
3 practice what you did in this case in arriving at
4 your expert conclusions in Ms. -- for Ms. Ramirez?

5 A. That's correct. I use exactly the
6 same approach for examining Ms. Ramirez's specimen
7 as I do in my routine, day-to-day practice.

8 Q. Okay. Showing you what we have
9 marked for identification as Exhibit 1.

10 ---PLAINTIFF EXHIBIT NO. 1: Curriculum
11 vitae of Vladimir Iakovlev, MD,
12 prepared March 18, 2016.

13 BY MR. ANDERSON:

14 Q. First can you please identify this
15 for the record?

16 A. This is my curriculum vitae.

17 Q. AND what is a curriculum vitae?

18 A. It's a document which describes all
19 my career, my education, my licenses, my
20 publications, my teaching.

21 Q. And you have it there in front of
22 you if you need to refer to it at any time. I
23 just want to go through with the jury a bit of
24 your background education and employment history,

1 okay?

2 A. Okay.

3 Q. Where do you currently work?

4 A. I work at St. Michael's Hospital,
5 Toronto, Canada.

6 Q. What is your current position?

7 A. I'm a pathologist and I'm also a
8 director of cytopathology at St. Michael's
9 Hospital.

10 Q. Okay, that's a new word. What is
11 cytopathology?

12 A. Cytopathology is part of anatomical
13 pathology but I'm focusing more on smaller
14 samples. When the samples are sucked out through
15 a fine needle or they are scraped.

16 Q. And how long have you been at St.
17 Michael's?

18 A. About nine years.

19 Q. Explain to the jury what you do,
20 Doctor, on a day-to-day basis at St. Michael as an
21 anatomic pathologist?

22 A. As an anatomic pathologist, or as
23 any pathologist we receive specimens. These
24 specimens are taken out by treating doctors or by

1 radiologist. So they take a biopsy or they resect
2 an organ and they send it to the lab. In the lab
3 we receive the specimen; we make sure that it
4 belongs to correct patient; we make sure that
5 everything is labelled correctly; and then we
6 examine this specimen or part of the body which
7 was resected, or biopsy. We describe it grossly
8 how it looks, how it feels by fingers. We cut
9 through it, look inside, how it looks inside and
10 then we decide how to take sections for
11 microscopic examination.

12 Q. When you say "sections" what do you
13 mean?

14 A. Sections when we slice it like a
15 bread through or we call it cross-sectioning, it's
16 like slicing bread. And then when we slice it we
17 can look inside and see what's inside. And then
18 we can take these slices and put them in the
19 microscope, shine light through and see what is in
20 the tissue.

21 So after we slice it with scalpel then
22 we submit it to make histological slides. And
23 then the lab makes histological slides, slides
24 like this, and then we use a microscope to examine

1 them in the microscope and then we describe it.

2 We go through morphological differential or

3 pathological differential diagnosis and we make a

4 diagnosis and report it to the treating doctors.

5 Q. Are you familiar with the term

6 clinico-pathological correlation?

7 A. Yes, I am.

8 Q. Can you explain what that means to

9 you as a pathologist this word

10 clinico-pathological correlation?

11 A. This is like putting different

12 pieces of information together, like species in

13 jigsaw puzzle. As I explain or as I described

14 when the patient comes in treating doctors examine

15 the patient, take history, so they collect some

16 pieces of information.

17 Then when I receive it I also see what

18 radiologist were reporting or describing by using

19 X-rays or CT scans and then I examine the

20 specimen. So I have my pieces of information.

21 When I put everything together then we can arrive

22 to the correct diagnosis. And this is called

23 "clinico-pathological correlation", when we

24 correlate all of the pieces of information from

1 clinical treating physicians, treating doctors to
2 pathology information.

3 Q. So please briefly describe for the
4 jury your education and training that prepared you
5 to work as a pathologist.

6 A. A pathologist needs to go first
7 through medical school. My medical school
8 training was in Russia. At that time system in
9 Russia was similar to United Kingdom. If people
10 do well, they have good grades in high school they
11 can be accepted in medical school straight out of
12 high school. I had good grades; I volunteer in
13 the ward; I attended some scientific society when
14 I was in high school; and I was accepted straight
15 from high school.

16 Q. And you say you volunteered at the
17 ward. Is that volunteering at the ward of a
18 hospital?

19 A. Yes.

20 Q. Go ahead, I'm sorry.

21 A. But you -- some people do first
22 degree, bachelor degree and then they apply to
23 medical school like here in North America so there
24 are two ways, but if you have good grades and show

1 your dedication you can be accepted straight from
2 high school.

3 When I completed high school it was a
4 time of great struggle in Russia, it was '90s.
5 The government didn't have enough money and they
6 couldn't invest into medical care. My wife and I
7 decided to move at that time and we came to
8 Canada. We took Canadian and American licensing
9 exams and then we continued our training as
10 anatomical pathologists here.

11 After I completed the residency then I
12 applied for research fellowship at Ontario Cancer
13 Institute. That is here in Toronto. This is the
14 largest cancer institute in Canada. And when I
15 completed it I had an offer from St. Michael's
16 Hospital and I was also appointed at the
17 University of Toronto.

18 Q. Where do you hold medical licenses?

19 A. I hold medical license in the
20 Province of Ontario, Canada, and the State of
21 Michigan, United States.

22 Q. Are you Board certified in any
23 fields?

24 A. I'm Board certified in anatomical

1 pathology by the Royal College of Physicians and
2 Surgeons of Canada, and by the Canadian --
3 American Board of Pathology.

4 Q. Real briefly how does one obtain
5 Board certification?

6 A. Board certification is obtained by
7 submitting all your education, training, and
8 experience. If it is found to be acceptable they
9 will allow you to sit the exam. You sit the exam
10 and if you are successful you obtain Board
11 certification.

12 Q. And do you have to retake the Board
13 certification exam?

14 A. Yes. This was a new approach lately
15 because the field of pathology is changing so fast
16 those pathologists who are not updating their
17 knowledge couldn't deliver the same standard of
18 care. So now the rule is to retake the certifying
19 exam every ten years. And I retook it last year,
20 it was a ten-year mark for me.

21 Q. As a current practicing pathologist
22 are you required to complete continuing medical
23 education courses in your field?

24 A. Yes, this is another initiative by

1 the American Board of Pathology and Royal College
2 of Physicians of Canada. This stimulates you to
3 study and update your knowledge yearly.

4 Q. Are you currently a member of any
5 professional societies in your field?

6 A. Yes. I am Fellow of the Royal
7 College of Physicians of Canada and College of
8 American Pathologists.

9 Q. Do you currently have any teaching
10 responsibilities?

11 A. Yes. I teach medical students. I
12 teach residents, pathology residents and residents
13 from other specialties. I teach
14 cytotechnologists, physiotherapists and
15 pathologists.

16 Q. What do you teaching duties entail?

17 A. For residents and fellow I teach
18 them practice of pathology how we do it
19 day-by-day; for cytotechnologists it's a more of a
20 formal sessions; for pathologists I do courses at
21 conferences and teach them the field of
22 cytopathology because I'm more focused on
23 cytopathology.

24 Q. Are those principles of differential

1 diagnosis and clinico-pathological correlation
2 that you just described for the jury a few minutes
3 ago, are those things that you teach to your
4 students as well as your fellows and your
5 residents?

6 A. Yes, because these are basic
7 principles. That's how we arrive to the correct
8 diagnosis.

9 Q. And did you apply those principles
10 in forming your expert conclusions that you'll be
11 presenting to the Court and the jury today?

12 A. Yes, I did.

13 Q. Have you written articles that have
14 been publish in the scientific literature?

15 A. Yes. I published over 20 full-size
16 articles and over 30 abstracts, I also presented
17 at multiple international meetings.

18 Q. Do any of those articles or
19 abstracts relate to your examination of explanted
20 surgical meshes made out of polypropylene like the
21 TVT-O sling device that is the subject of this
22 trial?

23 A. Yes.

24 Q. How many?

1 A. I published five papers, five
2 articles on this subject and over ten abstracts on
3 this subject of implantable meshes. Also I
4 presented -- I was invited to present at multiple
5 international scientific meetings.

6 Q. Has your research included
7 publications in the peer-reviewed literature on
8 the topics of, and I'll make a list, the pathology
9 of surgical meshes like TVT-O?

10 A. That's correct.

11 Q. Microscopic analysis of the changes
12 in the tissue when the mesh is implanted in the
13 body?

14 A. That's correct.

15 Q. Correlation of your microscopic
16 pathological findings to the mesh patients'
17 medical problems that led to surgical removal of
18 the mesh?

19 A. That's correct.

20 Q. Microscopic analysis of the
21 degradation of polypropylene mesh in the human
22 body including degradation of the TVT-O device?

23 A. Yes, I did.

24 Q. Have you ever been invited by a

1 medical device company to speak at one of their
2 conferences about polypropylene mesh products like
3 the TVT-O?

4 A. Yes, I was invited to one of these
5 conferences.

6 Q. And where was that?

7 A. There was an annual hernia repair
8 conference in Berlin.

9 Q. When was that?

10 A. It was in September last year.

11 Q. Who invited you to speak at that
12 conference?

13 A. It was a scientific committee of
14 Bard. Bard is a similar manufacturer like Ethicon
15 or competitor of Ethicon manufacturing implantable
16 meshes.

17 Q. I'm showing you what we have marked
18 as Exhibit 2.

19 ---PLAINTIFF EXHIBIT NO. 2: Brochure
20 for the Bard Davol Inc. European Hernia
21 Symposium, Berlin, Germany, 2015.

22 BY MR. ANDERSON:

23 Q. Can you please identify that for the
24 record?

1 A. Yes, this is the program of the
2 meeting.

3 Q. And can you please pull that up? If
4 you could blow up the top.

5 You mentioned the company Bard, is the
6 company that invited you to speak at this
7 international conference?

8 A. Yes, it is.

9 Q. Were there mesh scientists from
10 around the world at this conference?

11 A. Yes, there were.

12 Q. Including scientists and consultants
13 from Bard?

14 A. Yes.

15 Q. Including scientists and consultants
16 from Ethicon?

17 A. Yes.

18 Q. Did you interact with many of these
19 scientists and consultants at the conference?

20 A. Yes, I did.

21 Q. Have you spoken at other
22 international conferences about your research and
23 the topics you'll be presenting to the jury here
24 today?

1 A. Yes, I did.

2 Q. If we could go to the next page.

3 Highlight the top. You asked me to highlight some
4 of the names here. Are you familiar with these
5 names?

6 A. Um, these are co-authors of some
7 research articles we published together and my
8 name. You can see my name.

9 Q. If you can highlight the part of the
10 agenda where he spoke.

11 What topic were you invited to speak on
12 at this international conference?

13 A. This was a topic of pro's and con's
14 of surgery with mesh versus without mesh.

15 Q. Okay. Either at this mesh
16 conference, or at any of the international
17 conferences were you have presented your
18 scientific work on mesh, did any scientist, or
19 employee, or executive of any mesh manufacturer
20 ever stand up at the conference or come up to you
21 at any point and question you regarding your
22 credentials?

23 MR. HUTCHINSON: Objection, irrelevant.

24

1 BY MR. ANDERSON:

2 Q. We have your objection. Answer
3 please.

4 A. No.

5 Q. Did anyone question your experience?

6 A. No.

7 Q. Did anyone question your
8 credibility?

9 A. No.

10 Q. Did anyone question your
11 methodology?

12 A. No.

13 Q. Anyone question any of your
14 conclusions?

15 A. No.

16 Q. Anyone question any of your findings
17 from your peer-reviewed literature at this
18 conference, or any international conference at
19 which you've presented your scientific work on
20 mesh?

21 A. No.

22 Q. Shifting gears now, as part of your
23 daily practice at St. Michael's do you routinely
24 receive foreign bodies or foreign materials like

1 medical devices that have been removed from
2 patients for which you have been asked to render
3 medical diagnoses and opinion?

4 A. Yes, we receive them regularly.
5 Those devices would be cardiac valves, tissue
6 expanders, breast implants, hip joints, knee
7 joints and meshes.

8 Q. And do those meshes include
9 transvaginal meshes like the TVT-O sling?

10 A. Yes, they do.

11 Q. What are the primary reasons that
12 medical devices, like those you've just listed for
13 the jury, are removed and sent to you in
14 pathology?

15 A. Well, the first reason is we need to
16 document the receipt of the device and then we
17 need to describe it grossly. Then during
18 examination we need to rule out natural disease
19 like cancer which could cause these symptoms. And
20 then we can see what the changes were in the
21 tissue, if the changes were related just to the
22 device or to something else. And also we can
23 describe if the device was failing on its own due
24 to design defect or some other factors.

1 Q. Have you received surgically-removed
2 Ethicon meshes to perform pathological analysis as
3 your role as an anatomic pathologist at St.
4 Michael's Hospital? Let me see if I can ask a
5 better question.

6 In your role as an anatomic pathologist
7 at St. Michael's --

8 A. Yes.

9 Q. -- have you received, from surgeons,
10 Ethicon surgical meshes that have been explanted
11 from patients?

12 A. Yes, I did.

13 Q. And have you received those in order
14 to conduct pathological analysis and
15 clinico-pathological analysis?

16 A. Yes, I did.

17 Q. Approximately how many mesh
18 specimens have you examined in your career as a
19 pathologist?

20 A. Over 300 by now.

21 Q. How many of these would be vaginal
22 meshes versus hernia meshes made out of
23 polypropylene?

24 A. Approximately 100 would be hernia

1 meshes and over 200 would be transvaginal meshes.

2 Q. Those would include meshes made by
3 Ethicon?

4 A. Yes.

5 Q. And those would include
6 polypropylene meshes?

7 A. Most of them are polypropylene
8 meshes.

9 Q. At this time we tender Dr. Vladimir
10 Iakovlev as an expert in the following areas,
11 pathology, anatomic pathology, the pathology of
12 surgical meshes like the TVT-O, microscopic
13 analysis of the changes in the tissue when mesh is
14 implanted in the body, correlation of microscopic
15 pathological findings to mesh patients' medical
16 problems that led to surgical removal of the mesh,
17 and microscopic analysis of the degradation of
18 polypropylene mesh in the human body, including
19 degradation of the TVT-O device.

20 MR. HUTCHINSON: Counsel, we're
21 reserving our objections.

22 BY MR. ANDERSON:

23 Q. Based on your clinical experience as
24 a practicing pathologist, as well as your research

1 in analyzing over 300 polypropylene mesh explants,
2 do you have an opinion, to a reasonable degree of
3 medical certainty, as to whether there are
4 anatomic differences between the abdominal wall
5 and the vaginal?

6 A. Yes, there are.

7 Q. What is that opinion, Doctor?

8 A. The anterior abdominal wall is
9 composed of layers of tissue for skin, and some
10 fat, and then muscle, and then fascia, and then
11 all nerves and vessels are run parallel. When the
12 hernia is repaired the mesh is laid flat against
13 all the structures and then the abdominal wall
14 expands slightly and then goes up and down with
15 breathing, but there is not much more action
16 beyond that. So the role of the mesh is just to
17 hold the pressure.

18 Now, if we go to the female pelvis or
19 any pelvis there are no planes. The structures
20 are rounded and they are confined in a conical
21 shape in a confined space so there are no planes
22 in between the organs. The organs gradually
23 transition into each other and there are no planes
24 because the bladder is rounded, and then the

1 vagina is rounded as well and then the rectum also
2 is rounded.

3 And then the innervation comes from the
4 sides and then sprays like this to innervate the
5 bladder, the vagina and the rectum and then the
6 skin around the vagina from outside. So when the
7 mesh is placed it's crossing all this place -- all
8 this path of innervation inside the tissue.

9 Also when the mesh is placed it's not
10 placed parallel to one plane because there are no
11 planes. So it's placed in the tissues somewhere
12 between gradual transition. Also all the meshes
13 in the vagina are placed on the sensitive vaginal
14 mucosa. Mucosa is like skin just inside and it's
15 very close to the surface. Hernia meshes are not
16 put just under the skin. Hernia meshes are put
17 very deep down.

18 Also in the pelvic area there are lots
19 of action. The bladder needs to expand and
20 contract; the vagina needs to change shape during
21 intercourse; the rectum needs to function as well.
22 So it's not like in anterior abdominal where there
23 is not much action.

24 Q. Is the nerve density of the pelvic

1 area versus the nerve density for a woman's
2 abdominal area something you have published in the
3 peer-reviewed scientific literature?

4 A. Yes. I compared it -- on average if
5 we compare the entire abdominal wall and all areas
6 in the vagina, specifically around slings, the
7 difference is 11 times, over 11 times. The area
8 around slings in the vagina has 11 times more
9 innervation and then the anterior abdominal wall.

10 Q. And what does "innervation" mean?

11 A. Innervation means there are nerves
12 which are supplying the skin to feel it, to feel
13 the surface. Because the genital area needs to be
14 very sensitive, and we know why. And it's --
15 sensation is supplied by the nerves. You have
16 more nerves you have more sensation.

17 Q. Doctor, did we ask you to review
18 materials in this case and to give your expert
19 conclusions with regard to Ms. Jennifer Ramirez?

20 A. Yes.

21 Q. And, Dr. Iakovlev, you understand
22 you'll be expressing some expert conclusions and
23 opinions here today, correct?

24 A. Yes, I do.

1 Q. And can we agree that every opinion
2 you express here today will be to a reasonable
3 degree of medical certainty whether or not I ask
4 that before each question, is that agreed?

5 A. We agree.

6 Q. Doctor, are you here today to offer
7 any expert conclusions other than as an expert
8 pathologist?

9 A. No. I'm a pathologist. I offer any
10 opinions as a pathologist, as a doctor and as a
11 pathologist.

12 Q. And did you use the same approach in
13 this case, in Ms. Ramirez's case, that you do on a
14 day-to-day routine basis as an anatomic
15 pathologist at St. Michael's when you receive
16 explanted medical devices from surgeons there?

17 A. Yes, exactly the same approach.

18 Q. What did you receive in this case in
19 order to arrive at your expert conclusions for the
20 jury here today?

21 A. I received medical records and I
22 received the specimen in formalin.

23 Q. What do you mean by the specimen in
24 formalin? Please be specific for the jury.

1 A. Specimen in formalin was the part of
2 the sling or two piece of the sling which were
3 excised in March 2015.

4 Q. From Ms. Ramirez?

5 A. From Ms. Ramirez. They were
6 preserved in March 2015 in formalin.

7 Q. Okay. So for the record just
8 briefly summarize your understanding of
9 Ms. Ramirez's clinical course for the jury as it
10 relates to this case and as it relates to the work
11 that you've done in this case.

12 A. Ms. Ramirez had hysterectomy and
13 implantation of Ethicon TVT-O sling,
14 transobturator sling, in September 2010 for mild
15 stress urinary incontinence. Later on, sometime
16 around November, she started experiencing pain on
17 the left side. During examination the left side
18 of the string was found to be --

19 Q. The left side of the sling did you
20 say?

21 A. The left side of Ms. Ramirez or left
22 side of the sling was found to be bow stringing or
23 tight. It was tight and it was producing pain.
24 Therefore the decision was to release the tension

1 and to excise a part of it. And in December 2010
2 one centimeter of the sling was excised.

3 Then Ms. Ramirez continued to have some
4 symptoms and it continued on up to 2014 and 2015.
5 She continued to have pain on the left side and
6 also she had some urinary obstructive symptoms.

7 She was examined, the treating doctor
8 examined her, did investigations and the final
9 decision was to excise the residual part of the
10 sling. So in March 2015 the residual part which
11 could be excised was excised. Two pieces of two
12 centimeters were excised.

13 Q. Is that the part that you received
14 in order to analyze?

15 A. Yes, I did.

16 Q. Okay. Go ahead.

17 A. I received two parts.

18 Q. Okay.

19 A. But those side parts or lateral,
20 lateral means further sideways. Lateral parts are
21 still remaining in the body. They could not be
22 removed. They are too deep inside the muscle in
23 the obturator space. Both the left and the right
24 sides are deep inside and they are still here

1 today in Ms. Ramirez's body.

2 Q. You mentioned that the explant
3 samples of the TVT-O mesh that was removed from
4 Ms. Ramirez in March of 2015 was preserved by the
5 surgeon in formalin. Is that what you said?

6 A. That's correct.

7 Q. Can you please explain to the jury
8 what formalin is?

9 A. Formalin is preservative. It's been
10 used for over a hundred years. It's a standard
11 preservative for tissue. We preserve all
12 specimens, all biopsies in formalin to do our
13 microscopic examination. It preserves tissue and
14 it can stay in formalin pretty much forever, it
15 will not degrade.

16 Q. And did you analyze everything that
17 was made available to you?

18 A. Yes.

19 Q. Did you use the same procedures in
20 that analysis that you would with any similar
21 specimen in your daily practice?

22 A. Yes. They were analyzed exactly the
23 same way. They were loaded into the same machine
24 and the machine was in the same protocol as any

1 other diagnostic specimen.

2 Q. Do you know how the specimen was
3 handled before it came to you?

4 A. It was preserved in formalin. I did
5 not see any indication that it was outside of
6 regular range of handling as I see every day.

7 Q. And how do you determine that as a
8 pathologist to see if there was anything that was
9 done irregular in terms of the handling before it
10 came to you?

11 A. Well I can see what's the end
12 result. If the end result is unacceptable
13 something was done not correctly.

14 Q. Okay. And what did you do when you
15 received that tissue?

16 A. When I received the tissue we
17 divided it with the defense consultant. Each
18 piece, and I mentioned I received two pieces of
19 the excised sling. Each piece was divided in
20 half. One half was retained by the defense
21 consultant and the other halves were analyzed at
22 St. Michael's laboratory. I prepared microscopic
23 slides out of these two pieces.

24 Q. Explain to the jury how you prepared

1 the microscopic slides from Ms. Ramirez's surgery
2 in March of 2015 that you're going to show to them
3 today.

4 A. When we receive a specimen --

5 Q. Specifically talk about what you did
6 with Ms. Ramirez's sample. I know you said you do
7 it the same way every day but let's talk about her
8 sample if we could, Doctor.

9 A. When I received her specimen I
10 examined it grossly. I felt it with my hands, and
11 we will describe it later with pictures how it
12 looked grossly.

13 Q. Okay.

14 A. And then to look inside we need to
15 cut very thin slices. It's like I explain earlier
16 it's like slicing bread. And when we slice it
17 really thinly then we can put the slices of the
18 excised tissue on the glass slide like this.

19 Q. Is that one of the slides that has
20 some of Ms. Ramirez's tissue on it?

21 A. Yes. This is a slide and it's
22 labelled correctly with Ms. Ramirez's name. It
23 contains slices of the tissue I received and which
24 were removed in March 2015 from Ms. Ramirez's

1 body.

2 Q. How many of the slides did you stain
3 for her?

4 A. Seven.

5 Q. And what types of staining did you
6 use for those seven slides?

7 A. Because we cut them so thin they
8 become transparent, so in order to see what
9 structured -- what is what in this -- in the
10 tissue we need to stain it. Staining is like
11 dyeing a fabric. We use some dyes or some stains
12 and then we apply it and then some parts become
13 pink, some parts become blue and then I can see
14 them in the microscope.

15 There is one basic stain, the first
16 stain we usually do, it's called hematoxylin eosin
17 or in short we call it H&E. "H" means
18 hematoxylin, "E" means eosin. Eosin stains
19 proteins pink, hematoxylin stains nuclei blue.
20 All inflammatory cells stain blue, all scar tissue
21 stains pink.

22 Q. How long has H&E staining been
23 around and used by pathologists?

24 A. Around a hundred years.

1 Q. And did you use any other type of
2 staining other than H&E on any of Ms. Ramirez's
3 slides?

4 A. I also used newer techniques which
5 were developed relatively recently, like 50 years
6 ago, these are called "immunostains". These are
7 specific stains against specific proteins. And
8 when the protein is present the color is brown,
9 when the protein is not present or where in the
10 areas where there is no protein it's blue.

11 Q. What types of features in the tissue
12 can the blue versus brown staining help you as a
13 pathologist to identify?

14 A. For example, if I want to see nerves
15 better I can use S100 protein and then the nerves
16 will turn brown.

17 Q. On the slide?

18 A. On the slide and I can see them
19 easily.

20 Q. Did you use any other standard
21 pathological methods in your industry to analyze
22 Ms. Ramirez's explanted tissue to arrive at your
23 opinions that you will be offering to the jury
24 today?

1 A. Yes, I did.

2 Q. What was that?

3 A. Well first I use regular light on
4 the microscope and then I use polarizing light.

5 Q. And we will get into those finding
6 about your polarizing light a little bit later
7 okay?

8 A. Okay.

9 Q. Did you have the actual piece of
10 mesh or the pieces of mesh that were removed from
11 Ms. Ramirez's body in March of 2015?

12 A. Yes, I had them.

13 Q. Okay. Did you have the pathology
14 report issued by the hospital's pathologist who
15 received the tissue right after it was removed
16 from her body on March 10, 2015?

17 A. Yes, I had.

18 Q. And is that something that you
19 reviewed and relied upon in forming your opinions
20 in this case?

21 A. Yes.

22 Q. I'll hand you what has been marked
23 as plaintiff's Exhibit 3.

24 ---PLAINTIFF EXHIBIT NO. 3: Pathology

1 report from UT Southwestern Medical
2 Center re. Jennifer Ramirez, printed
3 4/1/2015.

4 BY MR. ANDERSON:

5 Q. Can you first identify that for the
6 record? And can you publish that please?

7 A. This is a pathology from UT
8 Southwestern Medical Center. It has name of
9 Ramirez Jennifer with date of birth March 10,
10 1982.

11 Q. What's the date of this record?

12 A. The specimen collection date is
13 March 10, 2015.

14 Q. What did the pathologist describe in
15 his pathology report of March 10, 2015?

16 A. So the final pathology diagnosis
17 was, "Vaginal mesh removal, synthetic mesh
18 material with embedded fibrous tissue with chronic
19 inflammation. No evidence of malignancy."

20 Q. Okay. Let's get that whole final
21 diagnosis up there. Thank you.

22 A. There was also clinical --

23 Q. Can you expand down to bottom
24 please?

1 A. There was also clinical information
2 provided with the specimen.

3 Q. What clinical information was
4 provided?

5 A. "Urinary dysfunction", and then,
6 "Questioned vaginal removal of suburethral tape."

7 Q. Do the findings that you are going
8 to show us here today differ from those made by
9 the pathologist at the hospital where Ms. Ramirez
10 had her mesh removed?

11 A. No.

12 Q. Please explain.

13 A. So we had exactly the same findings
14 that the material I received and the material
15 which was examined at UofT Southwestern Medical
16 Center contained the only pathological abnormality
17 of a mesh and tissue reaction to the mesh. There
18 was no natural disease like malignancy. And
19 correctly the pathologist answered the question of
20 the treating doctor that it is indeed suburethral
21 tape. See there is a question mark and he
22 answered, yes, it is suburethral tape or TVT-O
23 tape remove and there is no malignancy in the
24 specimen.

1 Q. What is the primary reason that
2 tissue is sent to pathology departments around
3 North America every day?

4 A. Well the most important reason any
5 pathology is sent to rule out malignancy because
6 we know malignancies kill.

7 Q. And malignancy meaning?

8 A. Cancers.

9 Q. Is this what this initial
10 pathologist did?

11 A. Yes.

12 Q. And was that the end of his
13 analysis.

14 A. Well, it was not exactly the end.

15 Q. Okay.

16 A. He described more what is abnormal
17 in the tissue. First he sees no cancer and he
18 reports it, and then he describes what is
19 abnormal. And the abnormality in the tissue is
20 synthetic mesh with fibrous tissue and chronic
21 inflammation. These are all pathological. We
22 normally don't have foreign bodies when we are
23 born, we don't have scarring when we are born and
24 we don't have inflammation.

1 Q. As part of your work in this case,
2 and after your review of the various stained
3 slides that you prepared at St. Michael's, did you
4 have additional findings to those of the hospital
5 pathologist?

6 A. Yes, I did.

7 Q. Can you explain that?

8 A. Well, because I was asked more
9 questions. I was asked to show or to report to
10 the Court and to the jury if pathological findings
11 correlate with the clinical presentation or with
12 the complications. So my first answer was the
13 same as for the pathologist, but since I was asked
14 to review this specimen in view of the litigation
15 I went one step further. I correlated those
16 pathological findings, which are the same, with
17 the symptoms.

18 Q. Did you endeavor to determine
19 whether or not from your analysis of the slides
20 and your review of the records as to what your own
21 pathological differential diagnosis was?

22 A. Yes, I did.

23 Q. And did you see if you could
24 determine whether those could be correlated to the

1 clinico-differential diagnosis by Ms. Ramirez's
2 treating doctors?

3 A. Yes, I did.

4 Q. And were you able to do that?

5 A. Yes, I was able to do that.

6 Q. And are those the expert conclusions
7 you're going to offer to the jury here today?

8 A. Yes.

9 Q. After you did the staining of
10 Ms. Ramirez's slides what did you do next?

11 A. Then I examined the slides in the
12 microscope. First I needed to see what's abnormal
13 in the tissue and then further examine in details
14 the abnormalities in the tissue.

15 Q. Did you also review her medical
16 records?

17 A. Yes, I did.

18 Q. Okay.

19 A. I needed to know the background,
20 what were the initial reasons why the sling was
21 implanted, and then what type of sling was
22 implanted, and when it was implanted and the
23 reason why it was implanted. First of all to
24 understand what device I'm looking at, second to

1 correlate the pathological changes with the
2 reasons for explantation. Because when the
3 physicians were going through the differential
4 diagnosis they ruled out several entities but then
5 the decision was to excise due to specific
6 reasons.

7 MR. HUTCHINSON: Move to strike as
8 nonresponsive.

9 BY MR. ANDERSON:

10 Q. I asked you whether or not you
11 reviewed medical records, correct?

12 A. That's correct.

13 Q. What was your purpose for reviewing
14 those medical records?

15 A. My purpose was to see what type of
16 device was; if there was foreign body indeed
17 implanted; what symptoms were developing and what
18 symptoms triggered excision of the mesh.

19 Q. Was it significant to your analysis
20 and ultimately your opinions as to what mesh was
21 implanted, why it was implanted, and when it was
22 explanted and why it was explanted?

23 A. Yes, it was significant.

24 Q. And did you review all of that and

1 take all of that into consideration before forming
2 your expert conclusion?

3 A. Yeah, I was basing -- I was reliant
4 on this clinical information, on the work-up of
5 treating doctors which was done for Ms. Ramirez.

6 Q. And are you here today to offer any
7 opinions as to whether or not her treating doctors
8 complied with the standard of care?

9 A. No.

10 Q. Did you take photographs of the
11 slides that were under the microscope?

12 A. Yes, I did.

13 Q. And what did you take those
14 photographs with?

15 A. With a camera, something similar
16 like this.

17 Q. Like the one that's sitting on top
18 of the microscope next to you here today?

19 A. Yes, something like this.

20 Q. What's the purpose of taking
21 photographs of the slides while they're on the
22 microscope?

23 A. To document my findings and to show
24 them to the jury and to the Court.

1 Q. Did you bring photomicrographs of
2 Ms. Ramirez's slides that you prepared here with
3 you today?

4 A. Yes, I did.

5 Q. Are they significant to your
6 opinions in this case?

7 A. Yes, they are.

8 Q. Did you also bring the slides
9 themselves? I see those are in front of you here
10 today?

11 A. Yes. These are the slides.

12 Q. Would it be helpful to show them to
13 the jury?

14 A. So I'm showing this to the jury.

15 Q. And are those the different stains
16 of these --

17 A. These are different stains and these
18 three are H&E stains, the one I just explained
19 hematoxylin and eosin. And these three are
20 immunostains, those blue and brown stains as I
21 explained. And they are done by slicing the
22 tissue like bread.

23 Q. Okay.

24 A. And then the slices are put on the

1 glass slide, and then to see what is what in the
2 tissue we stain them.

3 Q. Okay.

4 A. And here are different stains.

5 Q. Okay. We talked about
6 photomicrographs. You can put that down. We
7 talked about photomicrographs. Did you bring some
8 here today to show the jury?

9 A. Yes.

10 Q. Are these the same ones that would
11 have been provided previously to Ethicon's
12 lawyers?

13 A. Yes, they were.

14 Q. I'm showing you what we will mark as
15 a document set which will be 4(A) through 4(M)

16 ---PLAINTIFF EXHIBIT NO. 4(A) to 4(M):

17 Series of photographs taken by Dr.

18 Iakovlev during the examination of

19 Jennifer Ramirez's specimen.

20 BY MR. ANDERSON:

21 Q. Please identify this document set
22 4(A) through 4(M), Doctor.

23 A. These are photographs I took during
24 the examination of the specimen of Ms. Ramirez

1 which was removed from her body in March 2015.

2 Some of these are gross photographs and some of
3 them are microscopic photographs.

4 Q. You mentioned gross photographs.

5 Can we please put Exhibit 4(A) up?

6 A. So the gross photograph is something
7 which we see with naked eye, without the
8 microscope. And these are the two pieces that I
9 received. And this is the identifier for the
10 surgical case for St. Michael's Hospital. And we
11 can see here that these two pieces correspond to
12 what was correctly described as two pieces,
13 approximately 2 centimeter each. One appears to
14 be wider here, one is narrow here. And I will
15 show on the next photograph why one is wider and
16 one is a little bit narrower.

17 Q. Okay. Let's publish plaintiff's
18 4(B) please. What's the jury seeing in this
19 picture?

20 A. These are the same two pieces of
21 Ms. Ramirez's specimen which was removed in March
22 2015. Now it's a close-up and it's slightly
23 different angle. And now I can show that one
24 piece is -- this piece is flat and the other one

1 is curled, which will show better on the next
2 photograph.

3 Q. Let's go to plaintiff's Exhibit
4 4(C). Can you identify this for the record?

5 A. So this is a combined image of
6 previous gross photograph and two microscopic
7 images.

8 Q. Explain what we're seeing on the
9 left please, Dr. Iakovlev?

10 A. On the left there is a diagram
11 showing how we take slices. As I explained we
12 slice the tissue to make microscopic slides. It's
13 like taking slice of bread. So this would be a
14 slice, like this. And from this piece the slice
15 was taken parallel to the piece or flat to the
16 surface. It's like if we take a loaf of bread and
17 for the top piece the loaf of bread would be cut
18 perpendicular and for the bottom piece the loaf of
19 bread would be cut longitudinal.

20 Q. And are those two of the slides that
21 you showed the jury on this slide board here just
22 a few minutes ago?

23 A. Yes, they are exactly the same two
24 slides.

1 Q. Okay. In your opinion, Doctor, what
2 degree of scarring -- well, go ahead.

3 A. These are H&E stained slides. The
4 scar tissue, as I explained, stains pink. And you
5 can see pink color in between those clear spaces
6 and pink color here in between those clear spaces.

7 Now, why they are clear? Because
8 polypropylene is clear, it's like fishing line.
9 If there is no color in it it's clear. But some
10 fibers of the mesh are colored blue, and you can
11 see some of them blue here. Now, all these spaces
12 in between fibers are filled with scar tissue. To
13 help the jury to understand where the mesh fibers
14 are and where the tissue is I colored mesh fibers
15 with yellow color on the next image.

16 Q. Okay. Can we see 4(D)? Please
17 identify this for the jury.

18 A. These are exactly the same images as
19 you saw before. I just put yellow color in the
20 spaces where the mesh fibers are or were while in
21 the body of Ms. Ramirez. And --

22 Q. In your opinion, Dr. Iakovlev, what
23 degree of scarring is shown in Ms. Ramirez's
24 specimen?

1 A. There is one hundred percent
2 scarring. All the tissue we see here, all pink
3 tissue is scar tissue.

4 Q. Is there any healthy tissue in and
5 around the fibers of the explant as demonstrated
6 in Exhibit 4(D)?

7 A. No, there is none. What happens
8 when we damage the tissue or there is an empty
9 space in the body it becomes filled with scar
10 tissue. Our body heals through producing a scar
11 tissue. And in this case this space in between
12 mesh fibers did not exist before the mesh was
13 placed. It became filled with scar tissue during
14 healing.

15 Q. Are you familiar with the term
16 "bridging fibrosis"?

17 A. Yes, I am.

18 Q. Can you please explain?

19 A. So as you can see scar tissue fills
20 the spaces between mesh fibers or bridges from one
21 fiber to another, from one fiber to another. So
22 this is bridging fibrosis. Fibrosis and scarring
23 are the same.

24 Q. Okay. Are you familiar with the

1 term "scar plating" and "scar encapsulation"?

2 A. Yes.

3 Q. Can you please explain those and
4 whether or not we see those in Exhibit 4(D)?

5 A. Scar encapsulation happens with all
6 foreign bodies. All foreign bodies become
7 isolated from the body. The body tries to isolate
8 them and encase them in scar tissue. So this
9 would be scar encapsulation. Together with the
10 scar inside, the scar from outside, this would be
11 capsule and scar inside is bridging fibrosis, and
12 they all together they form one solid structure.
13 It's like concrete filling the spaces in between
14 the rebar. Rebar would be the mesh fibers and the
15 concrete would be scar tissue. It solidifies the
16 area and holds all mesh fibers within the scar
17 tissue.

18 Q. Are you familiar with the term "mesh
19 contraction" sometimes known as "mesh shrinkage"?

20 A. Yes, I am.

21 Q. What is that and how does it occur?

22 A. We know that all scar tissue in the
23 body contracts. You've probably seen some burn
24 victim when there is a large area and scar tissue

1 when it matures, when it heals, it contracts. The
2 body tries to minimize, to shrink the area of
3 damage. But when it contracts it's not as
4 flexible and it also pulls the tissue together so
5 people cannot move some arms if it's a large area.
6 The same happens with the scar tissue which is
7 inside the mesh. It pulls all the mesh fibers
8 together, it shrinks. And in terms of TVT or
9 TVT-O sling it tightens the sling because it
10 contracts within, it pulls everything together.

11 Q. Does it -- does contraction cause
12 the mesh implant to be stiffer or more flexible?

13 A. It becomes stiffer. Because you can
14 see scar tissue here is very dense. It's like a
15 tendon. It's as dense as tendon.

16 Q. Based on those images, and your
17 overall analysis of Ms. Ramirez's explant, do you
18 have an opinion to a reasonable degree of medical
19 certainty as to whether the TVT-O sling contracted
20 while in Ms. Ramirez's body?

21 A. Yes, I do.

22 Q. And what is that opinion?

23 A. My opinion is that TVT-O contracted
24 while it was in Ms. Ramirez's body.

1 Q. Is there anything else descriptive
2 in these images that you'd like to explain to the
3 jury?

4 A. That's interesting because, as I
5 explained, one piece is flat the other -- one
6 piece is curled. And the next image will show the
7 plain of curling in the top image.

8 Q. Can we see 4(E) please? Please
9 identify this for the jury and explain how it
10 relates to your opinions in this case?

11 A. These are the same images we just --
12 we saw before but the difference is I put this
13 thick yellow band to show how the sling curled.
14 So the sling, or TVT-O tape, curled in this piece,
15 or what sometimes treating doctors call "roped" or
16 there is a roping, or in this for Ms. Ramirez it
17 was called "bow stringing". It was like a tight
18 bow string.

19 And it happened because it curled up and
20 the space within the curl or within the roll was
21 filled with scar tissue. It's like concrete. It
22 filled the space within that's why it shows that
23 that curling occurred inside the body, which
24 correlates with the clinical description of bow

1 stringing. Because it was curled up like a rope,
2 it was filled with dense scar tissue and it
3 occurred in the body.

4 Q. Doctor, hypothetically if there is
5 testimony in this case that these slides that the
6 jury has been looking at show normal tissue around
7 and in between these mesh fibers, do you have an
8 opinion to a reasonable degree of medical
9 certainty about that?

10 A. I do.

11 Q. And what is that opinion?

12 A. My opinion is there is one hundred
13 percent scar tissue. There is no normal tissue
14 anywhere in this specimen. All of the tissue in
15 between mesh fibers is scar tissue, dense scar
16 tissue as dense as a tendon.

17 Q. Thank you, Doctor. If we could show
18 Exhibit 4(F) and 4(G). Can you please identify
19 those for the record?

20 A. These are microscopic images of the
21 specimen which was taken out of Ms. Ramirez's body
22 in March 2015. This is a higher power
23 magnification. These are two images. One image
24 is original image on the top, and the second image

1 is the same image but I just filled the spaces
2 where the mesh fibers are with yellow color just
3 to help the jury to orient where the mesh fibers
4 are.

5 Now, we can see pink color, which you
6 saw before. This is scar tissue, the same scar
7 tissue, but there is something in between like a
8 halo around the mesh fibers, in between mesh
9 fibers and the scar tissue. And this halo is
10 purple and then it has these dark blue dots.
11 These dark blue dots are nuclei of macrophages.

12 Q. Are nuclei of macrophages. Okay,
13 we're not all pathologists so can you just explain
14 to the jury what nuclei of macrophages are and why
15 that's important, in your view, regarding these
16 images?

17 A. Nuclei are center or the cell, it's
18 like a brain of the cell. It controls everything.
19 Macrophages are the fighter cells. The body sends
20 macrophages to fight with something which is
21 damaging the body, either bacteria or foreign
22 bodies. When the bacteria comes to macrophages
23 come and then they try to either destroy, dissolve
24 them or swallow them up and then destroy within

1 the macrophages.

2 In terms of foreign bodies the same
3 thing happens with the foreign bodies. The body
4 sends these fighter cells to degrade or destroy
5 the foreign body and they will be surrounding this
6 foreign body as long as the foreign body stays in
7 the body.

8 So what they do when they come they
9 start producing all this reactive chemicals which
10 can destroy, and which are designed to destroy and
11 degrade the foreign body and bacteria, and they
12 will stay there and they will produce these
13 reactive chemicals.

14 Q. Is the inflammation that we see in
15 Exhibits 4(F) and 4G transient or temporary
16 inflammation?

17 A. Absolutely not.

18 Q. Please explain.

19 A. This inflammation, this foreign body
20 type inflammation will stay as long as the foreign
21 body stays in the body.

22 Q. You're familiar with the term
23 "chronic" on "permanent inflammation"?

24 A. Yes, I am.

1 Q. What does that mean?

2 A. "Chronic" means long-term.

3 "Permanent" means forever.

4 Q. Is this chronic or permanent
5 inflammation from Ms. Ramirez's slides?

6 A. This is chronic and permanent as
7 long as foreign body stays in the body. This part
8 was removed but the lateral parts, the side parts,
9 deeper parts, are still in the body of
10 Ms. Ramirez.

11 Q. Do you have an opinion to a
12 reasonable degree of medical certainty as to
13 whether or not the pieces of the TVT-O sling that
14 are still in Ms. Ramirez continue to have chronic,
15 permanent inflammation in and around the mesh
16 fibers?

17 A. Yes, they will.

18 Q. Do you have an opinion, to a
19 reasonable degree of medical certainty, as to
20 whether or not Ms. Ramirez's TVT-O mesh caused the
21 chronic foreign body type inflammation, fibrotic
22 bridging, scar plating, scar encapsulation,
23 curling, roping and mesh contraction that you have
24 identified in these images?

1 A. Yes, I am.

2 MR. HUTCHINSON: Objection, foundation.

3 THE DEPONENT: Yes. I do have this --

4 BY MR. ANDERSON:

5 Q. What is that opinion?

6 A. My opinion is that mesh which was
7 implanted into Ms. Ramirez's body caused bridging
8 fibrosis, scar encapsulation, scar plating, nerve
9 entrapment, chronic foreign body reaction, scar
10 contraction and sling tightening while it was in
11 Ms. Ramirez's body.

12 Q. Doctor, you just mentioned bridging
13 fibrosis, scar encapsulation, scar plating, nerve
14 contraction and sling tightening while the mesh
15 was in Ms. Ramirez's body. Do you remember that?

16 A. I do.

17 Q. In your review of over 300 explanted
18 meshes, in the publications that you have put in
19 the peer-reviewed literature, at the conferences
20 at which you have spoken, international
21 conferences around the world, have you been able
22 to determine that there were similar findings in
23 those or some of those mesh explants?

24 MR. HUTCHINSON: Objection, foundation.

1 THE DEPONENT: Yes, I was able to.

2 These findings occur in almost all mesh specimens
3 to a degree, to different degrees, but all this is
4 happening in all mesh specimens.

5 BY MR. ANDERSON:

6 Q. And that's been reported in your
7 peer-reviewed literature?

8 MR. HUTCHINSON: Objection, leading.

9 BY MR. ANDERSON:

10 Q. Has that been reported in your
11 peer-reviewed literature?

12 A. It has been reported in
13 peer-reviewed literature before I started research
14 and then I continued the work and I published the
15 same findings.

16 Q. Showing you what's been marked as
17 plaintiff's Exhibits 4(H) and 4(I). Please
18 identify these images. First identify them for
19 the jury and then we'll talk about what they show.

20 A. These are -- this is one image. One
21 is unlabelled the other one is labelled. It's a
22 microphotograph of the area of the specimen which
23 was removed in March 2015 from Ms. Ramirez's body.
24 The same type of staining as you saw before called

1 hematoxylin eosin or H&E.

2 Q. Now let's go to images 4(J) and --
3 oh wait. Go ahead.

4 A. I wanted to show one area here.

5 Q. Okay. So can you please describe in
6 the upper and lower image where these nerve
7 branches are and what is surrounding the nerve
8 branches?

9 A. So these are the nerve branches and
10 this is part of the mesh, or mesh fibers. And the
11 nerve branches are entrapped in scar tissue. So
12 this would be the same magnification but in a
13 labelled image. So these are nerve branches but
14 it's somewhat difficult to see them in H&E section
15 so I use a different stain to show them better.

16 Q. You mentioned before an S100
17 staining to the jury?

18 A. That's correct.

19 Q. Did you do S100 staining of these
20 same slides?

21 A. Yes, I did.

22 Q. And did you bring those here with
23 you today to show the jury?

24 A. Yes.

1 Q. Can you publish 4(J) and 4(K).

2 Doctor, are 4(J) and 4(K) the same tissue sample
3 as 4(H) and 4(I) that the jury just saw?

4 A. Yeah. It's exactly the same area
5 it's just a different stain. These mesh fibers
6 are the same you saw before.

7 Q. What is the blue area that the jury
8 is seeing?

9 A. Blue here is a different dye
10 staining scar tissue. So scar tissue can be
11 stained pink in H&E and in this stain it's blue.
12 Now, if we zoom in now we can see that the nerve
13 branches or nerves are staining brown. This is
14 the mesh fiber, this is scar tissue and these are
15 nerves which are sitting in the scar tissue.

16 Q. Are those nerves -- strike that.

17 Are there different types of nerves in
18 the human body? First answer that question. Are
19 there different types of nerves in the human body?

20 A. There are.

21 Q. Are you familiar with the terms
22 "sensory nerves" and "motor nerves"? Are you
23 familiar with the term?

24 A. I'm familiar with the term but it's

1 slightly incorrect term, sensory nerves of motor
2 nerves.

3 Q. Can you please explain that?

4 A. Most of the nerves in our body are
5 mixed. What is separate, sensory versus motor,
6 are fibers. So a nerve is like a bundle, like a
7 thick capable containing multiple wires and the
8 wires inside are nerve fibers, but the nerve
9 itself contains multiple nerve fibers. So one
10 fiber can be motor, one fiber can be sensory but
11 they are all together in one nerve.

12 Q. So are these nerves that we see here
13 mixed nerves, like you just described, or are they
14 separated?

15 A. To a reasonable degree of medical
16 certainty these nerves are mixed. Another
17 additional piece of information is where are we in
18 the body specifically for this specimen?

19 Q. Okay.

20 A. This was excised right underneath
21 vaginal mucosa.

22 Q. Why is that significant to your
23 opinion?

24 MR. HUTCHINSON: Move to strike as

1 nonresponsive.

2 THE DEPONENT: It is significant --

3 BY MR. ANDERSON:

4 Q. Hold on. So you explain that the --
5 to a reasonable degree of medical certainty these
6 nerves are mixed nerves, correct?

7 A. That's correct.

8 Q. What area of the body are these
9 nerves coming from and is that significant to your
10 opinions?

11 A. They come from underneath of vaginal
12 mucosa and it is significant to my opinions.

13 Q. Why?

14 A. Because in that area most of the
15 function of the nerves is to supply sensation from
16 vaginal mucosa. There is not much motor function
17 in the area. There are no more large organs. The
18 bladder is all the way back. There are no more
19 muscles here. They are right next to mucosa.
20 There is not much else to do for the nerves other
21 than just provide sensation from the mucosa.

22 Q. Okay. Let's look at the next
23 photograph, 4(L) and 4(M). Please identify these
24 images for the jury and then explain what they

1 show.

2 A. This is another image of the nerves,
3 brown staining, however, this one shows that the
4 nerves are within the mesh. They are between the
5 fibers. So these nerves, and I will zoom in,
6 these nerves they grew into the mesh spaces after
7 the mesh was placed.

8 Q. Why is that significant to your
9 opinion?

10 A. Because these nerves are not just
11 trapped in the scar tissue. They are also trapped
12 in the mesh. So when the mesh was placed the
13 nerves grew through the pores of the mesh and
14 became trapped in the mesh. So, first of all they
15 are in scar tissue firmly fixed, immobilized in
16 scar tissue. Second, they are within the pores.
17 So if the sling is moved or contracted they will
18 pull on the nerves.

19 Q. What's the effect of pulling on the
20 nerves in this fashion to the body?

21 A. It will produce pain. It's like
22 pinched pain or pulled nerve. Pinched nerve or
23 pulled nerve.

24 Q. Okay.

1 A. Also because they are in this tight
2 space and within dense scar tissue they can become
3 distorted further.

4 MR. HUTCHINSON: Move to strike as
5 nonresponsive.

6 BY MR. ANDERSON:

7 Q. And what happens when a nerve is
8 distorted?

9 A. It produces pain.

10 Q. Do you have an opinion to a
11 reasonable degree of medical certainty as to the
12 condition of the nerves that we see here in
13 plaintiff's 4(I), (J), (K), (L) and (M)?

14 A. The nerves themselves are normal so
15 they are healthy nerves which can conduct healthy
16 pain symptoms -- sensation. So they can conduct
17 pain but the position of them is abnormal.

18 Q. Why do you say that?

19 A. They are in scar tissue inside the
20 mesh or outside of the mesh. It's not normal to
21 have nerves in the scar tissue. Scar tissue is
22 not normal tissue, it is abnormal tissue and it is
23 abnormal to have nerves trapped in the scar
24 tissue.

1 Q. Doctor, hypothetically if there is
2 testimony during this trial that nerve fibers that
3 deliver pain signals to the brain cannot be
4 stained with this S100 staining that you've been
5 showing to the jury would you have an opinion
6 about that?

7 A. I would.

8 Q. And what is that opinion, and have
9 you brought anything to help demonstrate that to
10 the jury?

11 A. My opinion is that it doesn't matter
12 for the purpose of my opinions, and generally for
13 the analysis of the specimen, and I explain you
14 why.

15 Q. Have you brought something to
16 demonstrate to the jury?

17 A. I brought a demonstrative image.

18 Q. And do you believe it would be
19 helpful to the jury in order to explain your
20 conclusions in this regard?

21 A. Yes, I do.

22 Q. I'm handing you what has been marked
23 as Exhibit 5.

24 ---PLAINTIFF EXHIBIT NO. 5: Diagram

1 depicting the spinal cord.

2 THE DEPONENT: Thank you.

3 BY MR. ANDERSON:

4 Q. Doctor, please identify that for the
5 record.

6 A. This is a diagram showing spinal
7 cord, so this would be person lying down, facing
8 down and this would be the back of the person and
9 this is spinal cord. And these are nerves which
10 are coming out of spinal cord. And as I explain
11 you earlier, the nerves combine multiple wires or
12 multiple nerve fibers. Some of the fibers are
13 insulated so some are myelinated. And S100 stain
14 stains this insulation, it doesn't stain the fiber
15 itself or the wire itself but it stains
16 insulation. Some of the nerve fibers are not
17 insulated but they run in the same bundle. And
18 all of them run together insulated, or myelinated,
19 S100 positive or S100 negative, all of them run
20 together. And I can show you how it's similar to
21 what I saw in Ms. Ramirez's body.

22 MR. HUTCHINSON: Excuse me. Note my
23 objection for the record. This document is not in
24 Ms. Ramirez's report, it's not in his reliance

1 list. Note my objection for the record.

2 MR. ANDERSON: And it is a demonstrative
3 aid used for purposes of the record, like we
4 normally do for trials in using demonstrative
5 aids.

6 BY MR. ANDERSON:

7 Q. So go right ahead. And would you
8 like to compare this to the S100 stain?

9 A. Yes.

10 Q. Please put up that S100. If you
11 could put that up next to the nerve.

12 A. I'll do it myself.

13 Q. Please explain to the jury why you
14 have put the S100 stain from Ms. Ramirez next to
15 demonstrative aid on the left?

16 A. So you can see that there is
17 staining in some of the fibers but there's no
18 staining in other fibers, but they are all
19 together. So all those dark blue nuclei or dots,
20 and some of them are staining brown some of them
21 are not staining brown. But it doesn't matter,
22 they are all together. Motor fibers, sensory
23 fibers they are all together in one nerve.

24 Q. What is that significant to your

1 opinions, if at all, with regard to whether or not
2 S100 can stain sensory nerves?

3 A. It doesn't matter, as I said. They
4 are all together in one fiber. If S100 stains
5 other nerve fibers not those which conduct pain
6 they're still there in one bundle.

7 MR. ANDERSON: Okay. We need to take a
8 break.

9 THE VIDEOGRAPHER: Going off the record
10 at 10:27 a.m.

11 --- Break taken.

12 THE VIDEOGRAPHER: We're back on the
13 record at 10:37 a.m.

14 BY MR. ANDERSON:

15 Q. Okay. Doctor, going back to this
16 overlaid image that we were showing the jury a
17 minute ago where we had the blue staining over the
18 top of Exhibit 5?

19 A. Yes.

20 Q. Do you remember this? So just to be
21 clear, I may have misspoken. What type of
22 staining is the image on the right?

23 A. So right now this is S100 stain.
24 Previously we saw neurofilament stain, this is

1 S100 stain. And if I can have my mouse back. So
2 now we have some staining here and some fibers are
3 not staining.

4 Q. Okay.

5 A. Exactly what happens in the diagram.
6 Some fibers are myelinated, or insulated, they
7 stain with S100 some fibers are not. Pain can be
8 delivered by either myelinated or nonmyelinated.
9 There are two main type of fibers which deliver
10 pain, but again it doesn't matter. All of them
11 are bundled together in one nerve. Its' a mixed
12 nerve, sensory and motor. If we see a nerve there
13 will be sensory fibers, there will be fibers which
14 deliver pain signals to the brain.

15 Q. Thank you.

16 MR. HUTCHINSON: Move to strike as
17 nonresponsive.

18 BY MR. ANDERSON:

19 Q. All of the things that you just
20 mentioned to the jury do you hold those to a
21 reasonable degree of medical certainty?

22 A. Yes, I do.

23 Q. Doctor, I'd like to discuss your
24 findings regarding your pathological analysis of

1 Ms. Ramirez's urinary symptoms, okay?

2 A. Okay.

3 Q. From your review of Ms. Ramirez's
4 medical records could you determine which parts of
5 the TVT-O sling were explanted and sent to
6 pathology from her 2010 and 2015 explant
7 surgeries?

8 A. Yes. I could correlate operative
9 reports, pathological descriptions and my
10 examination of the specimen.

11 Q. Did you, with my help, prepare a
12 demonstrative slide in order to demonstrate these
13 explants from these two surgeries?

14 A. Yes, I did.

15 Q. Do you believe they would be helpful
16 to the jury in expressing your opinions?

17 A. Yes, I do.

18 Q. Would you please show Exhibit 6?

19 ---PLAINTIFF EXHIBIT NO. 6: Diagram
20 prepared by Dr. Iakovlev depicting the
21 relationship of the excised pieces to
22 the anatomical structures in Ms.
23 Jennifer Ramirez's body.

24

1 BY MR. ANDERSON:

2 Q. Exhibit 6 identified and used for
3 demonstrative purposes only. Can you please
4 identify this for the jury?

5 A. This is a diagram I prepared in my
6 expert report to show the relationship of the
7 excised pieces to the anatomical structures in
8 Ms. Ramirez's body. So she had --

9 Q. Explain what we're seeing in the
10 upper photo please?

11 A. She had implantation of TVT-O sling
12 in September 2010 and it's colored yellow. These
13 red triangles on the left, this would be
14 Ms. Ramirez's left, our right. And this would be
15 Ms. Ramirez's right. These triangles are muscle
16 behind the bone, or spaces within the
17 transobturator space. And this separate of the
18 sling is the part which is exposed or can be found
19 if we do dissection. And this is relationship of
20 the sling to the urethra. So it was under the
21 urethra. We know what happened. By November of
22 2010 the left side became painful. It was
23 described as bow stringing.

24 Q. Is that where you have your cursor

1 pointed right now?

2 A. Yes. So this is Ms. Ramirez's left.
3 The decision at that time was to excise that part
4 of sling and release the pressure. And we know
5 why that pressure occurred or the tensioning
6 occurred.

7 Q. And why was that, Doctor?

8 A. I explained to you the sling roped
9 up; it became filled with dense scar tissue; scar
10 tissue contracted, pulled it together, tightened
11 it so that bow stringing was at the roped mesh
12 contracted because of scar contraction.

13 Q. Is that in the area where you're
14 showing in the second slide, is that what you're
15 talking about?

16 A. Yes. And this area was excised,
17 partially excised, only 1 centimeter was excised
18 in 2010.

19 Q. Were you able to look at the piece
20 that was excised in 2010 from Ms. Ramirez's body?

21 A. No. As far as I understand it was
22 not preserved.

23 Q. And what are we seeing now in the
24 lower image?

1 A. So Ms. Ramirez continued to have
2 symptoms and in 2015, in March of 2015 two
3 portions were excised. And you can see here that
4 one portion was still a portion of the left side.

5 Q. And what is that little orange dash
6 that's going down underneath the urethra, there?

7 A. This is the middle portion and it
8 identifies which side is left and which side is
9 right. So this side was still from the area which
10 was described as bow stringing or cording. And we
11 can see that one piece during gross examination
12 was roped up. So this correlates with the left
13 side which was found clinically roped.

14 Q. Now, Doctor, are you in this picture
15 trying to suggest what Jennifer's urethra actually
16 looked like?

17 A. No, I just show where the position
18 is.

19 Q. Okay.

20 A. So we agreed that pain was here
21 because of tightening of the sling contraction.
22 And when it was tightening it was compressing into
23 the urethra.

24 Q. So on the bottom image where it

1 says, "Excised in two portions", please explain
2 that diagram.

3 A. So when the remaining part was
4 excised in 2015, which was still held by scar
5 tissue on the left, the urethra was opened up so
6 the pressure on urethra was released. The
7 pressure which was caused by the contracted mesh
8 was released.

9 Q. And are those two excised portions
10 the ones that you showed the jury just a few
11 moments ago?

12 A. Yes.

13 Q. And were you able to analyze those
14 and those are the slides that you have here today?

15 A. Yes, you saw all the images which
16 were coming out from these two pieces.

17 Q. Okay. You can take that down.

18 A. Yes.

19 Q. And let's shift gears now, Doctor,
20 and discuss something -- a scientific principle
21 known as "degradation". Are you familiar with
22 that term?

23 A. Yes, I am.

24 Q. In the context of polypropylene

1 meshes implanted in the human body, like the TVT-O
2 device that was implanted in Ms. Ramirez, what
3 does the term degradation mean to you as a
4 scientist and pathologist?

5 A. The term of degradation, in
6 relationship to implanted transvaginal meshes,
7 means that the material of the mesh changes,
8 changes because the body is attacking it. It's
9 trying to destroy or degrade it. So it's intended
10 purpose of the inflammatory response to degrade it
11 and that's what happens to polypropylene. It
12 changes, it degrades.

13 Q. Did you make any microphotographs
14 from the slides in order to demonstrate this
15 principle of degradation from Ms. Ramirez's
16 explant that you brought here to show the jury
17 today?

18 A. Yes, I did.

19 Q. Can we see Exhibit 7(A) and (B)
20 please.

21 ---PLAINTIFF EXHIBIT NO. 7(A) to 7(D):
22 Series of high magnification images
23 depicting the specimen from Mr. Ramirez
24 excised in March 2015.

1 BY MR. ANDERSON:

2 Q. And I've marked these as a document
3 set which are 7(A) through 7(D).

4 Please identify just broadly what we
5 have in 7(A) through (D) and then we'll go to the
6 two images, 7(A) and (B).

7 A. These are high-magnification images
8 of the same specimens as we saw before.

9 Q. Did you make these?

10 A. Yes. I made them using high-power
11 objectives.

12 Q. Okay.

13 A. And this is the same specimen of
14 Ms. Ramirez's TVT-O which was excised in March
15 2015.

16 Q. Please explain to the jury what
17 we're seeing in images 7(A) and 7(B)?

18 A. The images are focusing on one mesh
19 fiber. And as you saw earlier some mesh fibers
20 are clear, some mesh fibers are blue.

21 Q. What's that blue area there?

22 A. This one is blue because, as I said,
23 if polypropylene is not colored it's clear, it's
24 like fishing line. It's hard to see. So Ethicon

1 introduced blue granules into it so it's easier to
2 see in the tissue. It's like colored fishing
3 line. And the dye, which colors it blue, is in
4 granules. And all those granules are introduced
5 into polypropylene by Ethicon when the meshes are
6 manufactured.

7 Q. So just to orient the jury, is this
8 like taking a slice of the fiber?

9 A. I brought something to demonstrate
10 how we slice the fibers in a histology section.

11 Q. Do you think it would be helpful to
12 the jury?

13 A. It will.

14 Q. And is it significant to your
15 opinions?

16 A. Yes, it is.

17 Q. Okay. Tell us what you have,
18 Doctor?

19 A. If we imagine that a mesh fiber is a
20 tree trunk. And we cut mesh fibers the same way
21 as we would cut a tree with a chain saw. But if
22 we take a slice, like a slice of bread but we take
23 slice it with chain saw we would produce something
24 like, a slice of tree trunk. That's exactly what

1 happens in the images.

2 Q. So explain how that relates to the
3 images please?

4 A. Now, when the tree grows there is
5 central core of the tree trunk, but then the
6 exposed surface changes because it is exposed to
7 environment. The trees grow bark, so this is the
8 bark of the tree. It's the same wood but it's
9 changing, it's adapting to whatever is outside.
10 There are some cracks and crevices and some
11 cavities in the bark, the same wood but looks
12 slightly different. It can peel off as well. The
13 same happens in the body with polypropylene
14 fibers.

15 Q. And what is that cracked -- that
16 outer layer that we're looking at there? In the
17 bottom end it says "degradation layer". Explain
18 that and these arrows at the bottom please.

19 A. So the central core, like core of
20 the tree trunk is not degraded, it's not bark yet.
21 But the outer layer of polypropylene degrades,
22 it's like bark on the tree. And because it has
23 all these cavities it can be stained.

24 Q. Why is it purple there were the

1 arrow is?

2 A. Because histological dyes can stay
3 inside all these cracks. They can attach inside
4 those cavities and cracks and they can stain
5 purple. But the central part, the central core is
6 solid so histological dyes cannot attach to it
7 that's why it stays clear.

8 Q. Okay. If you can put that down.
9 Did you do anything else to rule out that this
10 outer layer of bark is or is not polypropylene?

11 A. Well, first of all I looked at the
12 granules. You can see the blue granules are in
13 polypropylene. And that was intention of Ethicon,
14 put blue granules to see where polypropylene is.
15 The same thing happens in the microscope. You see
16 blue granules it's polypropylene. And you see
17 blue granules in the purple area and it's also in
18 the bark which is separated. So you cannot
19 explain those blue granules by overlap of this
20 layer with the central core. It's separated but
21 still has the blue granules.

22 Q. Did you use any other type of
23 pathological technique in order to rule out
24 whether there is polypropylene?

1 A. I used polarized light, as I
2 mentioned earlier.

3 Q. Explain to the jury briefly what
4 polarized light is.

5 A. Polarized light is a neat technique
6 which was developed a hundred years ago to see
7 foreign bodies in the tissue. Polarizing filters
8 are like polarized sun glasses, there are fine
9 slits in them so they limit the amount of light to
10 specific orientation.

11 Q. Did you take pictures in polarized
12 light of the same mesh fiber that you showed us
13 earlier?

14 A. Yes, I did.

15 Q. Showing you Exhibits 7(C) and (D).
16 What are we seeing in these images?

17 A. These are exactly the same areas in
18 the microscopic slides of Ms. Ramirez's specimen.
19 I just turned the polarizing filters in the
20 microscope and took photograph. And you can see
21 in polarized light both the nondegraded part and
22 the degraded bark are bright compared with the
23 collagen in all other proteins of the body which
24 are much darker in the body.

1 Q. Is there a name for that? You said
2 "brightness", is there a scientific name for that?

3 A. The scientific name for that is
4 "birefringence".

5 Q. Let's just stick with brightness
6 then.

7 A. Brightness, okay.

8 Q. Go ahead.

9 A. And you can see that the bark, you
10 can even easier the cracks in the bark. It's
11 peeling off and it's cracking. And it's the same
12 polypropylene because it's bright, birefringent.
13 It has the same blue granules as the core and it's
14 very different from all proteins which are
15 surrounding the mesh fibers.

16 MR. HUTCHINSON: Move to strike as
17 nonresponsive.

18 BY MR. ANDERSON:

19 Q. Doctor, before we were talking about
20 the birefringence or the brightness of the outer
21 layer.

22 A. Yes.

23 Q. Can you explain what the
24 significance is of this brightness and this outer

1 layer displayed in 7(D) where the arrows are?

2 A. The significance is that the bright
3 parts in the image indicate polypropylene. Both
4 the nondegraded core of the fiber is bright and
5 the bark is bright and both are made of
6 polypropylene. The only difference is the bark is
7 degraded polypropylene and the central part is
8 nondegraded.

9 Q. Doctor, have you reviewed the
10 scientific literature regarding the degradation of
11 polypropylene in human beings?

12 A. Yes, I did.

13 Q. And have you published in the
14 literature, scientific literature amongst your
15 peers about the degradation of polypropylene in
16 the human body?

17 A. Yes.

18 Q. Is -- have you used the microscope
19 in order to come up with these images that we just
20 saw?

21 A. Yes.

22 Q. Can you just take one of the -- one
23 of the images and put it on there and let's take a
24 look and see what's that's like for the jury?

1 A. Yes, I can do it.

2 Q. Okay, let's do that.

3 A. This is how it looks from the
4 microscope. I will focus. This is H&E stained
5 slide of Ms. Ramirez's specimen which was taken in
6 March 2015. This pink color is scar tissue, and
7 this blue part, partially folded and displaced,
8 the central core of the mesh fiber. Because when
9 the knife of microtome slices it to make the
10 slices it pushes them away, pushes the central
11 part of the fibers away so they get displaced.

12 Q. Okay. Now let's see what it looks
13 like using the polarizing filters if you would
14 please?

15 A. Now I will take the polarizing
16 filter and I will turn it inside the microscope.
17 And when I turn it you can see that the bright
18 parts are polypropylene. And the central core,
19 which is displaced, is bright here, and the bark,
20 because it has all these cracks, is attached to
21 the tissue. Collagen anchors to it and holds it
22 in the tissue and it stays close to the tissue,
23 and you can see the cracks of the degradation
24 bark. But you can see how dark are the proteins.

1 All proteins of the human body are dark. The only
2 bright part or birefringent parts are
3 polypropylene.

4 Q. Okay. You can take that down.

5 Is there a body of scientific literature
6 that's been published about polypropylene
7 degradation, including polypropylene sutures?

8 A. Yes.

9 Q. Have you reviewed medical literature
10 from other doctors, pathologists, scientists and
11 biomaterials experts who have published
12 peer-reviewed literature on the subject of
13 polypropylene degradation in the human body?

14 A. Yes, I have.

15 Q. Have you reviewed as much of this
16 published literature about degradation of
17 polypropylene mesh as possible?

18 A. I try to review everything I could
19 find in publically available sources.

20 Q. Rather than go through them all have
21 you helped me prepare some slides of the studies
22 that you find particularly relevant to your
23 opinions regarding degradation of transvaginal
24 meshes?

1 A. Yes, I did.

2 Q. Before we get into those slides,
3 Doctor, I'm handing you what has been marked as
4 plaintiff's Exhibit 8.

5 ---PLAINTIFF EXHIBIT NO. 8: Article
6 titled "Comparison of the In Vivo
7 Behavior of Polyvinylidene Fluoride and
8 Polypropylene Sutures Used in Vascular
9 Surgery", found in OSAIO Journal 1998.
10 Bates labelled ETH.MESH.05845592 to
11 ETH.MESH05845599.

12 BY MR. ANDERSON:

13 Q. Can you tell us what this is?

14 A. This is an article.

15 Q. From what journal?

16 A. Published from ASAIIO Journal.

17 Q. Okay. And what year was it
18 published?

19 A. It was published in 1998.

20 Q. Who is the lead author?

21 A. The lead author is Celine Mary.

22 Q. And was this article peer reviewed?

23 A. Yes, it is peer reviewed.

24 Q. Did you read and review this article

1 in forming the opinions that you're giving here
2 today?

3 A. Yes, I did.

4 Q. Is this a recognized and reliable
5 publications for doctors in your field?

6 A. Yes, it is.

7 Q. Do experts in your field customarily
8 rely on this type of journal in forming medical
9 and scientific opinions?

10 A. Yes, they do.

11 Q. And did you rely on it in forming
12 the opinions that you're giving here today?

13 A. Yes, I did.

14 Q. Showing you what we'll mark as
15 plaintiff's Exhibit 9.

16 ---PLAINTIFF EXHIBIT NO. 9: Article
17 titled "Structural alterations of
18 prosthetic meshes in humans" found in
19 Hernia Journal, 2003.

20 BY MR. ANDERSON:

21 Q. Can you please identify the journal
22 from which plaintiff's Exhibit 9 comes?

23 A. This is Hernia Journal.

24 Q. Okay. And was it published?

1 A. It was published in 2003.

2 Q. Who is the lead author?

3 A. The lead author is Coda.

4 Q. And is this article peer reviewed?

5 A. Yes, it is.

6 Q. Did you review and read this article
7 in forming the opinions you're giving here today?

8 A. Yes, I did.

9 Q. Is this a recognized and reliable
10 publication for doctors in your field?

11 A. Yes, it is.

12 Q. Do experts in your field customarily
13 rely on this type of journal in forming medical
14 and scientific opinions?

15 A. Yes, they do.

16 Q. Did they rely on it in forming your
17 opinions that you're giving here today?

18 A. Yes, I did.

19 Q. And now I'll hand you plaintiff's
20 Exhibit 10.

21 ---PLAINTIFF EXHIBIT NO. 10: Article
22 titled "Materials Characterization of
23 Explanted Polypropylene Hernia Meshes"
24 found in the Journal of Biomedical

1 Materials Research Part B: Applied
2 Biomaterials.

3 BY MR. ANDERSON:

4 Q. Was this published?

5 A. It was published in --

6 Q. Was it published?

7 A. It was published.

8 Q. In what journal?

9 A. Journal of Biomedical Materials
10 Research Part B: Applied Biomaterials.

11 Q. What year?

12 A. It was published in 2007.

13 Q. Was this article peer reviewed?

14 A. Yes, it is.

15 Q. Who's the lead author?

16 A. Lead author is Costello.

17 Q. Did you read and review this article
18 in forming the opinions that you're giving here
19 today?

20 A. Yes, I did.

21 Q. Is this a recognized and reliable
22 publication for doctors in your field?

23 A. Yes, it is.

24 Q. Do experts in your field customarily

1 rely on this type of journal in forming medical
2 and scientific opinions?

3 A. Yes, they do.

4 Q. Did you rely on it in forming the
5 opinions you're giving here today?

6 A. Yes I did.

7 Q. Showing you what's been marked as
8 plaintiff's Exhibit 11.

9 ---PLAINTIFF EXHIBIT NO. 11: Article
10 titled "Materials characterization of
11 explanted polypropylene, polyethylene
12 terephthalate, and expanded
13 polytetrafluoroethylene composites:
14 Spectral and thermal analysis", found
15 in Journal of Biomedical Materials
16 Research Part B: Applied Biomaterials.

17 BY MR. ANDERSON:

18 Q. Was this article published?

19 A. Yes, it was.

20 Q. And what journal was it published
21 in?

22 A. Journal of Biomedical Materials and
23 Research B: Applied Biomaterials.

24 Q. What year was it published?

1 A. It was published in 2010.

2 Q. Who is the lead author?

3 A. Lead author is Cozad.

4 Q. Is this article peer reviewed?

5 A. Yes, it is.

6 Q. Did you read and review this article
7 in forming the opinions that you are giving here
8 today?

9 A. Yes, I did.

10 Q. Is this a recognized and reliable
11 publication for doctors in your field?

12 A. Yes, it is.

13 Q. Do experts in your field customarily
14 rely on this type of journal in forming medical
15 and scientific opinions?

16 A. Yes, they do.

17 Q. Did you rely on it in forming the
18 opinions you are giving here today?

19 A. Yes, I do.

20 Q. Marking plaintiff's Exhibit 12 for
21 identification.

22 ---PLAINTIFF EXHIBIT NO. 12: Article
23 titled "Physical Characteristics of

24 Medical Textile Prostheses Designed for

1 Hernia Repair: A Comprehensive Analysis
2 of Select Commercial Devices", found in
3 MDPI Materials, 2015.

4 BY MR. ANDERSON:

5 Q. Was Exhibit 12 published?

6 A. Yes, it was.

7 Q. In what journal?

8 A. MDPI Materials.

9 Q. And what year was it published?

10 A. It was published in 2015.

11 Q. What is the lead author?

12 A. Lead author is Miao.

13 Q. And was this article peer reviewed?

14 A. It was.

15 Q. Did you review and read this article
16 in forming the opinions that you're giving here
17 today?

18 A. Yes, I did.

19 Q. Is this a recognized and reliable
20 publication for doctors in your field?

21 A. Yes, it is.

22 Q. Do experts in your field customarily
23 rely on this type of journal in forming medical
24 and scientific opinions?

1 A. Yes, they do.

2 Q. Did you rely on it in forming the
3 opinions you are giving here today?

4 A. Yes, I did.

5 Q. Showing you what's been marked as
6 plaintiff's Exhibit 13.

7 ---PLAINTIFF EXHIBIT NO. 13: Article
8 titled "Degradation of polypropylene in
9 the human eye: A sem-study", found in
10 Documenta Ophthalmologica, 1986.

11 BY MR. ANDERSON:

12 Q. Can you please identify whether this
13 article was published?

14 A. It was published.

15 Q. In what journal?

16 A. Documenta Ophthalmologica.

17 Q. And who is the lead author?

18 A. Lead author is Jogenbloed.

19 Q. And what year was it published?

20 A. 1986.

21 Q. And is this article peer reviewed?

22 A. Yes, it is.

23 Q. Did you read and review this article
24 in forming the opinions that you are giving here

1 today?

2 A. Yes, I did.

3 Q. Is this a recognized and reliable
4 publication for doctors in your field?

5 A. Yes, it is.

6 Q. Do experts in your field customarily
7 rely on this type of journal in forming medical
8 and scientific opinions?

9 A. Yes, they do.

10 Q. Did you rely on it in forming the
11 opinions you are giving here today?

12 A. Yes, I did.

13 Q. Showing you what has been marked as
14 Exhibit 14.

15 ---PLAINTIFF EXHIBIT NO. 14: Article
16 titled "Reinforcement Materials in Soft
17 Tissue Repair: Key Parameters
18 Controlling Tolerance and Performance -
19 Current and Future Trends in Mesh
20 Development", found in the journal New
21 Techniques in Genital Prolapse Surgery,
22 2011.

23 BY MR. ANDERSON:

24 Q. Was this article published?

1 A. It was.

2 Q. And in what journal was it
3 published? Bottom of the page.

4 A. New Techniques in Genital Prolapse
5 Surgery.

6 Q. What year was it published?

7 A. It was published in 2011.

8 Q. And who is the lead author of this
9 publication in Exhibit 14?

10 A. Lefranc.

11 Q. And is this article peer reviewed?

12 A. Yes, it is.

13 Q. Is this a recognized and reliable
14 publication for doctors in the field?

15 A. Yes, it is.

16 Q. Did you read and review this article
17 in forming the opinions that you're giving here
18 today?

19 A. Yes, I did.

20 Q. Do experts in your field customarily
21 rely on this type of journal in forming medical
22 and scientific opinions?

23 A. Yes, they do.

24 Q. Did you rely on it in forming the

1 opinions that you are giving here today?

2 A. Yes, I did.

3 Q. Showing you what has been marked as
4 plaintiff's Exhibit 15.

5 ---PLAINTIFF EXHIBIT NO. 15: Article
6 titled "Subcutaneous Implants of
7 Polypropylene Filaments", found in the
8 Journal of Biomedical Material
9 Research, 1976.

10 BY MR. ANDERSON:

11 Q. Was this article published?

12 A. Yes, it was.

13 Q. And what article -- I'm sorry, what
14 journal was it published in?

15 A. Journal of Biomedical Material
16 Research.

17 Q. What year was it published?

18 A. 1976.

19 Q. And who is the lead author in this
20 publication?

21 A. Leibert.

22 Q. Is this article peer reviewed?

23 A. Yes, it is.

24 Q. Did you read and review this article

1 in forming the opinions that you're giving here
2 today?

3 A. Yes, I did.

4 Q. Is this a recognized and reliable
5 publication for doctors in your field?

6 A. Yes, it is.

7 Q. Do experts in your field customarily
8 rely on this type of journal in forming medical
9 and scientific opinions?

10 A. Yes, they do.

11 Q. Did you rely on it in forming the
12 opinions you're giving here today?

13 A. Yes, I did.

14 Q. Showing you what's been marked as
15 plaintiff's Exhibit 16.

16 ---PLAINTIFF EXHIBIT NO. 16: Article
17 titled "Degradation, infection and heat
18 effects on polypropylene mesh for
19 pelvic implantation: what was known and
20 when it was known", found in the
21 International Urogynecology Journal,
22 2011.

23 BY MR. ANDERSON:

24 Q. Was this article published?

1 A. Yes, It was.

2 Q. In what journal?

3 A. International Urogynecology Journal.

4 Q. And who is the lead author?

5 A. Ostergard.

6 Q. Was this peer reviewed?

7 A. It was.

8 Q. Have you read and reviewed this
9 article in forming the opinions that you're giving
10 here today?

11 A. Yes, I did.

12 Q. Is this a recognized and reliable
13 publication for doctors in your field?

14 A. Yes, it is.

15 Q. Do experts in your field customarily
16 rely on this type of journal in forming medical
17 and scientific opinions?

18 A. Yes, they do.

19 Q. Did you rely on it in forming the
20 opinions that you are giving here today?

21 A. Yes, I did.

22 Q. Just a few more here, Doctor. I'm
23 showing you what has been marked as Exhibit 17.

24 ---PLAINTIFF EXHIBIT NO. 17: Article

1 titled "Post-Implantation alterations
2 of Polypropylene in the Human", found
3 in The Journal of Urology, 2012.

4 BY MR. ANDERSON:

5 Q. Was this article published?

6 A. Yes, it was.

7 Q. And what journal was this article
8 published in?

9 A. The Journal of Urology.

10 Q. And what year was it published?

11 A. It was published in 2012.

12 Q. Who is the lead author on this
13 publication?

14 A. Sternschuss.

15 Q. Was this published in a
16 peer-reviewed journal?

17 A. Yes, it was.

18 Q. Was this article peer reviewed?

19 A. Yes, it was.

20 Q. Did you read and review this article
21 in forming the opinions that you are giving here
22 today?

23 A. Yes, I did.

24 Q. Is this a recognized and reliable

1 publication for doctors in your field?

2 A. Yes, it is.

3 Q. Do expert in your field customarily
4 rely on this type of journal in forming medical
5 and scientific opinions?

6 A. Yes, they do.

7 Q. Did you rely on it in forming the
8 opinions you are giving here today?

9 A. Yes, I did.

10 Q. I'm showing you what's been marked
11 as plaintiff's Exhibit 18.

12 ---PLAINTIFF EXHIBIT NO. 18: Article
13 titled "Materials characterization and
14 histological analysis of explanted
15 polypropylene, PTFE, and PET hernia
16 meshes from an individual patient",
17 found in the Journal of Material
18 Medicine, 2013.

19 BY MR. ANDERSON:

20 Q. Was this article published?

21 A. Yes, it was.

22 Q. What journal was it published in?

23 A. Journal of Material Science,
24 Material Medicine.

1 Q. Was it published -- what year was it
2 published?

3 A. 2013.

4 Q. Who is the lead author?

5 A. Wood.

6 Q. Is this article peer reviewed?

7 A. Yes, it is.

8 Q. Did you read and review this article
9 in forming the opinions that you are giving here
10 today?

11 A. Yes, I did.

12 Q. Is this a recognized and reliable
13 publication for doctors in your field?

14 A. Yes, it is.

15 Q. Do experts in your field customarily
16 rely on this type of journal in forming medical
17 and scientific opinions?

18 A. Yes, they do.

19 Q. Did you rely on it in forming the
20 opinions you are giving here today?

21 A. Yes, I did.

22 Q. I'm showing you what has been marked
23 as Exhibit 19.

24 ---PLAINTIFF EXHIBIT NO. 19: Article

1 titled "Pathology of Explanted
2 Transvaginal Meshes", found in World
3 Academy of Science, Engineering and
4 Technology International Journal of
5 Medical, Health, Pharmaceutical and
6 Biomedical Engineering, 2014.

7 BY MR. ANDERSON:

8 Q. Do you recognize this article?

9 A. Yes, I do.

10 Q. And was it published?

11 A. It was.

12 Q. And in what journal was it
13 published?

14 A. World Academy of Science,
15 Engineering and Technology International Journal
16 of Medical, Health, Pharmaceutical and Biomedical
17 Engineering.

18 Q. And who is the lead author?

19 A. Me.

20 Q. And was this peer reviewed?

21 A. Yes, it was.

22 Q. And did you read and review -- well,
23 are you using this article to form the opinions
24 that you are giving here today?

1 A. Yes, I am.

2 Q. Is this a recognized and reliable
3 publication for doctors in your field?

4 A. Yes, it is.

5 Q. Do experts in your field customarily
6 rely on this type of journal in forming medical
7 and scientific opinions?

8 A. Yes, they do.

9 Q. Did you rely on it in forming the
10 opinions you're giving here today?

11 A. Yes, I did.

12 Q. Last but not least, I'm showing you
13 plaintiff's Exhibit 20.

14 ---PLAINTIFF EXHIBIT NO. 20: Article
15 titled, "Degradation of polypropylene
16 in vivo: A microscopic analysis of
17 meshes explanted from patients", found
18 in the Journal of Biomedical Materials
19 Part B, 2015.

20 BY MR. ANDERSON:

21 Q. Was this article published?

22 A. It was.

23 Q. And what journal was it published
24 in?

1 A. It's Biomedical Materials Part B.

2 Q. Journal of Biomaterials Part B?

3 A. Yes. Journal of Biomaterials Part

4 B.

5 Q. Who's the lead author on this?

6 A. Me.

7 Q. And when was it published?

8 A. It was published in 2015.

9 Q. Okay. Was it peer reviewed?

10 A. It was.

11 Q. Did you rely upon this in forming

12 the opinions that you're giving here today?

13 A. Yes, I did.

14 Q. Is it a recognized and reliable

15 publication for doctors in your field?

16 A. Yes, it is.

17 Q. Do experts in your field customarily

18 rely on this type of journal in forming medical

19 and scientific opinions?

20 A. Yes, they do.

21 Q. Did you rely on it in forming the

22 opinions that you're giving here today?

23 A. Yes, I did.

24 Q. Doctor, after looking at all of

1 these and identifying the record, please tell us
2 what was significant about all of these articles
3 taken as a whole to the opinions you're expressing
4 here today?

5 MR. HUTCHINSON: Objection.

6 THE DEPONENT: All these articles they
7 show that for decades researchers continue to
8 study polypropylene degradation in the body using
9 different methods starting from 1970's. And their
10 conclusion was always the same, polypropylene
11 degrades in the body.

12 BY MR. ANDERSON:

13 Q. Doctor, have you assisted me in
14 making some slides to demonstrate some of the
15 findings in this literature regarding
16 polypropylene degradation?

17 A. Yes, I did.

18 Q. Okay. And do you think that would
19 be helpful to the jury in this case?

20 A. It would.

21 Q. Is it significant to your opinions?

22 A. It is.

23 Q. If you could pull up Exhibit 21
24 please.

1 ---PLAINTIFF EXHIBIT NO. 21: Printout
2 of PowerPoint slides created with the
3 assistance of Dr. Iakovlev for
4 presentation to the jury.

5 BY MR. ANDERSON:

6 Q. Exhibit 21 is a PowerPoint slide.

7 Is this is the presentation that you helped me
8 create for the jury?

9 A. Yes, it is.

10 Q. And if we could pull up the first
11 slide. What is this -- please identify this first
12 slide and tell us whether or not it's significant
13 to your opinions?

14 A. Well, these are headings of some of
15 the articles we just went through. It shows the
16 range of the techniques and repeated conclusions
17 over the last 50 years.

18 Q. Okay.

19 A. Next slide please.

20 Q. Why is this slide significant to
21 your opinions?

22 A. This slide shows one of the first
23 publications showing that polypropylene degrades
24 while implanted in the body. It dates to 1976.

1 And the conclusion was:

2 "Analysis shows that degradation
3 begins to occur after only a few days.
4 Although the reaction sequence is not
5 known several factors suggest that the
6 in vivo degradation process is similar
7 to auto-oxidation which occurs in air
8 or oxygen."

9 And that was in 1976.

10 Q. Okay. Next slide. Let's go back
11 just one second. We've heard this word "in vivo"
12 a couple of times, and the jury has probably heard
13 it by this time, but what does "in vivo" mean,
14 Doctor?

15 A. In vivo means in the body. It can
16 be any body, human body, animal body. In a live
17 body.

18 Q. Okay, next slide please. What is
19 this slide please, Doctor?

20 A. This slide shows a list of the
21 articles we just went through. It shows that
22 there is a range of different journals, people
23 from different countries and continents, different
24 dates, 1986, 2011, 2014, 2003, '98. And all of

1 them showed the same conclusion that polypropylene
2 degrades in the body.

3 Q. From your review of them can you
4 tell whether or not these are different scientists
5 from different specialties?

6 A. Yes. I can see their affiliations,
7 what they are. Surgeons, bioengineers. I'm a
8 pathologists. Other pathologists were involved.

9 Q. Okay. Next slide.

10 A. And doesn't matter where
11 polypropylene is implanted. In the eye, we saw
12 that some ophthalmological journals were published
13 in. In animals or in humans it still degrades
14 while it's in the body. Doesn't matter what part
15 of the body, it degrades.

16 Q. Okay. Next slide.

17 A. Next slide. And this is the list of
18 authors, I mean, this is part of the people who
19 made the conclusion that polypropylene degrades in
20 the body. And some of them are Ph.D. scientists,
21 some of them are medical doctors, some of them are
22 surgeons, some of them are pathologists like me
23 and some of them are gynecologists.

24 Q. Did you try and compile the entire

1 list of all the scientist and doctors over the
2 last 40 or 50 years who have published on this?

3 A. No, this is just one group.

4 Q. Okay. Next slide. Why do we have
5 this slide, Doctor?

6 A. This is one of the papers, and this
7 is example of the conclusions we see in these
8 papers. In this specific study the authors
9 compared three different mesh materials which were
10 explanted from the same patient and they did
11 side-by-side comparison. "Polypropylene mesh
12 demonstrated chemical degradation via oxidation,
13 permanent distortion of the mesh and changes in
14 thermal properties."

15 Q. Why is that important, Doctor?

16 A. It supports all other papers, all
17 other articles, all other studies and my
18 publications as well. All of those studies they
19 make the same conclusion.

20 Q. Next slide please. Why is this
21 slide significant to your opinions, Doctor?

22 A. This is another example of the
23 conclusion. Another paper, another group of
24 scientists. "Overall the results support our

1 hypothesis that oxidation is involved with the
2 degradation of polypropylene hernia mesh
3 materials."

4 Q. You mentioned your publications.

5 Next slide please. One question, Doctor, you
6 mention in the last article that that was a hernia
7 mesh?

8 A. Yes, it was.

9 Q. From your review of the records,
10 your publications, your review of all of the
11 scientific journals, your presentation at
12 conferences with other scientists and doctors, as
13 well as your examination of over 300 explanted
14 meshes, have you noticed any difference or
15 similarities between explanted hernia
16 polypropylene meshes versus explanted transvaginal
17 meshes?

18 A. In terms of degradation?

19 Q. Yes.

20 A. All of them degrade.

21 Q. Thank you. Now this slide.

22 A. These are my publications where I
23 describe polypropylene degradation which occurs in
24 vivo, and that's what happened in Ms. Ramirez's

1 body.

2 Q. Okay, you can take that down.

3 Doctor, based upon your background,
4 training, experience, based upon your work as a
5 pathologist over these many years, based upon your
6 review of over 300 explanted, polypropylene meshes
7 and over -- over 200 transvaginal meshes,
8 including Ethicon meshes, based upon your
9 publications in the literature, your review of all
10 the publications in the literature, as well as all
11 of the work that you've done in this case, do you
12 have an opinion to a reasonable degree of medical
13 certainty as to whether or not the TVT-O mesh that
14 was implanted in Ms. Ramirez degraded?

15 A. Yes, I do.

16 Q. And what is that opinion?

17 A. My opinion is that TVT-O mesh made
18 out of polypropylene degraded while in the body of
19 Ms. Ramirez and is still degrading. The remaining
20 parts which remain in her body are still
21 degrading.

22 MR. HUTCHINSON: Objection. Move to
23 strike as nonresponsive.
24

1 BY MR. ANDERSON:

2 Q. Doctor, do you have an opinion as to
3 whether or not the mesh that is still in her body
4 is still degrading?

5 A. Yes, I do.

6 Q. And what is that opinion?

7 A. My opinion is that those parts which
8 are left in the body of Ms. Ramirez are still
9 degrading.

10 Q. Doctor, based upon all of the work
11 that you've done and your publications, and your
12 review of all the explanted meshes, do you have an
13 opinion, to a reasonable degree of medical
14 certainty, as to what complications degraded mesh
15 causes in vaginal tissue?

16 A. So the degradation occurs on all
17 surfaces of the mesh fibers. The entire mesh has
18 surface which is covered with degraded
19 polypropylene. All interactions between the body
20 and mesh occur through this degraded layer. From
21 day one after implantation the interactions
22 between the body and the mesh is not through
23 pristine polypropylene, it's always going through
24 this degraded layer.

1 Q. What's the significance of that?

2 MR. HUTCHINSON: Objection. Move to
3 strike as nonresponsive.

4 BY MR. ANDERSON:

5 Q. Go ahead.

6 A. So all what we see, what happens
7 after, is mediated through this degraded layer.

8 Q. What do you mean by "mediated"
9 through the degraded layer?

10 A. Because all interactions, the
11 sensing of the foreign body, the chemical
12 interactions, the physical interactions are all
13 through this degraded surface. The surface
14 becomes brittle, we saw cracking. So the entire
15 surface, the entire mesh is covered with this
16 crust of brittle, hardened material.

17 Q. And what physical changes have you
18 noted in the brittle, explanted transvaginal
19 meshes?

20 A. It leads to hardening, stiffening,
21 embrittlement of the mesh.

22 Q. In your opinion what does that mean
23 to the patient if there's a hardened and brittle,
24 stiffened mesh in the transvaginal tissues?

1 A. So it doesn't stay soft and flexible
2 it becomes harder, it becomes stiffer.

3 Q. And what does the stiffness mean to
4 the patient?

5 A. It damages the tissue around it. It
6 can damage it easier because it's much stiffer
7 than the tissue around it.

8 Q. And back to my earlier question. Do
9 you have an opinion as to whether or not this
10 stiffness, and this rigidity, and this degradation
11 in Ms. Ramirez's TVT-O sling caused any of her
12 injuries in this case?

13 MR. HUTCHINSON: Objection, foundation.

14 THE DEPONENT: Yes, I do.

15 BY MR. ANDERSON:

16 Q. And what injuries do you believe, to
17 a reasonable degree of medical certainty the
18 degradation caused for Ms. Ramirez?

19 A. Well, as I said, all interactions
20 between the body and the mesh are going through
21 this degraded layer.

22 Q. What specific complications as it
23 went through that layer did the degraded mesh
24 cause or contribute to for Ms. Ramirez?

1 MR. HUTCHINSON: Same objection,
2 foundation.

3 THE DEPONENT: Pain, pain on sexual
4 intercourse, urinary symptoms.

5 BY MR. ANDERSON:

6 Q. Do you have an opinion as to whether
7 or not what you have depicted in some of these
8 images as degraded polypropylene, this cracked
9 outer layer or this bark that you described for
10 the jury, whether that is biologic material or
11 something like protein from the body that changed
12 the polypropylene? Do you have an opinion on
13 that?

14 A. I do.

15 Q. And what's that opinion?

16 A. My opinion is it is not biological
17 material. After conducting several tests and
18 observations.

19 Q. What tests did you do and what
20 observations did you make to rule out whether or
21 not the formalin, and other chemicals which are
22 used to make the slides in this case, had anything
23 to do with the degradation bark in the cracked
24 outer layer?

1 A. Well, first of all I showed you the
2 features I saw in the microscope.

3 Q. Okay.

4 A. The blue granules, the behavior of
5 the material in polarized light. This was all
6 consistent with the earlier published body of the
7 literature that polypropylene degrades in vivo.
8 Then I also observed several other features in my
9 research.

10 Q. What was that?

11 A. The first feature I observed that
12 the outer layer can be stained with different
13 histological dyes.

14 Q. What do you mean by that?

15 A. Any dye I would use or any stain
16 would stain it. It can be red, it can be blue, it
17 can be green. There is no difference. If it's
18 positively charged dye, negatively charged dye,
19 larger molecule size, small, it all stains. It
20 stains nonspecifically.

21 Q. What do you mean by these stains
22 stain the bark layer nonspecifically?

23 A. It means that the staining is not
24 due to specific electrostatic forces or some other

1 specific forces. There is a nonspecific staining
2 because of the porosity, because of the cavities
3 in the bark layer. However, several stains do not
4 stain it.

5 Q. What do you mean by that?

6 A. And those stains are specifically
7 designed to stain proteins. And those stains
8 which you saw brown stains they did not stain it.
9 There is no protein inside. It does not stain
10 with protein stains.

11 Q. Did you do anything else to rule out
12 whether or not formalin, or any other chemicals
13 that are used to prepare the pathological sample
14 for the slides, or anything else had anything to
15 do with this degraded bark in the cracked outer
16 layer?

17 A. Yes, I did.

18 Q. What did you do?

19 A. I took several pieces of pristine
20 mesh, put it in formalin for four months, and then
21 took it out of formalin and loaded it with other
22 specimens through the same processing protocol or
23 processing sequence as all other specimens. They
24 all went through the same chemicals.

1 Q. And what were your findings?

2 A. And the findings were that there is
3 no degraded layer after four months in formalin
4 and exposure to all chemicals to make the slides.

5 Q. In your research did you ever have
6 an occasion to see any explanted mesh before it
7 was put into formalin or before histological
8 slides were created?

9 A. Yes, I had the chance.

10 Q. Please explain that to the jury and
11 explain what your findings were.

12 A. I was called from OR when the
13 excision was done.

14 Q. At St. Michael's?

15 A. At St. Michael's.

16 Q. When you say "OR" do you mean the
17 operating room?

18 A. Operating room.

19 Q. Now explain it slowly so that the
20 jury can understand.

21 A. The patient had symptoms of pain,
22 the sling had to be excised. And when I examined
23 it, while it was fresh, while it was not dried
24 yet, while it was -- even before it was put in

1 formalin, some fibers were sticking out. I
2 examined it in the microscope and I saw extensive
3 cracking.

4 Q. And is that -- are the photographs
5 of that in your peer-reviewed publications?

6 A. Yes, they are.

7 Q. Thank you. Did you use standards --
8 sorry, strike that.

9 Did you use procedures and protocols
10 that are standard in your industry to conduct the
11 formalin testing on the pristine mesh that had
12 never been implanted in the body?

13 A. Yes, I did.

14 Q. Doctor, with regard to the usage of
15 polarized light to assess the mesh explants you
16 were showing the jury the thing like you use
17 fishing glass lenses a few minutes ago. Do you
18 remember that?

19 A. Yes, I do.

20 Q. Are there other scientist that have
21 used this polarization technique in order to
22 examine whether or not there's polypropylene mesh
23 in tissue samples on microscopic slides like you
24 did?

1 A. Yes. The technique was introduced
2 in 1920's to identify sutures, even at that time.

3 MR. HUTCHINSON: Objection. Move to
4 strike as nonresponsive.

5 BY MR. ANDERSON:

6 Q. Has it been around since the 1920s,
7 Doctor?

8 A. Yes, it has.

9 Q. Great. Have you seen any
10 peer-reviewed publications where they used
11 polarized light in these same techniques?

12 A. Yes, I did.

13 Q. I'm showing you what's been marked
14 as plaintiff's Exhibit 22.

15 ---PLAINTIFF EXHIBIT NO. 22: Article
16 titled "Pathologic Evaluation of
17 Explanted Vaginal Mesh:
18 Interdisciplinary Experience From a
19 Referral Center", found in the Journal
20 of Female Pelvic Medicine &
21 Reconstructive Surgery, 2013.

22 BY MR. ANDERSON:

23 Q. You asked me to highlight this
24 article for purposes of presentation to the jury?

1 A. Yes, I did.

2 Q. Is this -- was this article
3 published?

4 A. Yes, it was.

5 Q. What journal was it published in?

6 A. Female Pelvic Medicine and
7 Reconstructive Surgery.

8 Q. In what year?

9 A. 2013.

10 Q. Who's the lead author?

11 A. Smith.

12 Q. Was this a peer-reviewed article?

13 A. Yes, it was.

14 Q. Is this something that doctors like
15 yourself rely on in forming medical and scientific
16 opinions?

17 A. Yes, it is.

18 Q. Did you read and review this in
19 forming the opinions that you're giving here
20 today?

21 A. Yes, I did.

22 Q. Is this a recognized and reliable
23 publication for doctors in your field?

24 A. Yes, it is.

1 Q. What is -- can you publish that?

2 What is the significance to you of Exhibit 22?

3 A. So this is the authors, this is the
4 journal. And if we can go to top part of the
5 paper?

6 Q. It says there "objectives". What
7 does that objective word mean when it comes to a
8 scientific journal like this?

9 A. Objectives are the aims of the study
10 or the goal. What they're trying to achieve or
11 what they're trying to study.

12 Q. Okay. What was the goal of what
13 they were trying to achieve in this study?

14 A. "In light of vaginal mesh safety
15 concerns we reviewed our institutional
16 experience with analytical process and
17 pathologic findings of explanted
18 vaginal meshes to identify problems and
19 opportunities to facilitate improved
20 documentation and research."

21 Q. How many cases did they review?

22 A. They reviewed 102 cases.

23 Q. If you scroll down please to the
24 conclusion section. Just briefly describe what

1 they concluded in this paper, Doctor?

2 A. Their experience suggested that:

3 "Gross and histologic examination

4 is appropriate for mesh explants.

5 Documentation of clinical history, mesh

6 product and material was frequently

7 incomplete and associated with

8 increased submission of tissue for

9 histologic examination and inaccurate

10 gross impression of material type. We

11 recommend..."

12 That was their recommendation, "improved

13 documentation to aid pathologic examination and

14 enable future of pathophysiologic study of mesh

15 complications."

16 Q. Do you agree with that conclusion?

17 A. I do. I frequently see --

18 Q. And why do you agree with it? Why

19 is it significant to you, Doctor?

20 A. Because when I review the medical

21 records I frequently see incomplete and partially

22 inaccurate pathological diagnosis.

23 Q. Please explain what you mean?

24 A. Sometimes it's only gross

1 examination, sometimes it describes only one part
2 of the findings, it does not list all pathological
3 findings. And the information which is delivered
4 cannot be related back to the clinical symptoms
5 because it's incomplete.

6 Q. And if we turn over to page 240 of
7 this. And if you highlight the top part of the
8 page. Why did you want to point this out to the
9 jury, these highlights, Doctor?

10 A. So these are images similar to what
11 we saw. The images are of mesh. And you see
12 those spaces you saw before in Ms. Ramirez's
13 specimen. Those are clear spaces.

14 Q. Okay.

15 A. The same stain, H&E stain. And they
16 use the same technique. They use polarized light
17 to identify where polypropylene is. And you can
18 see these are polypropylene fibers here in the
19 tissue.

20 Q. And under -- the text underneath
21 the -- under the figure for figure B it says,
22 "Polarized micrograph showing brightly colored
23 birefringent." Is that the word you used before
24 in terms of what brightly means?

1 A. Yes. Bright means birefringent or
2 birefringent means bright in polarized light.

3 Q. You can take that down.

4 Doctor, do you know if anyone else in
5 your field of practice or in science has used the
6 same methods to test if polypropylene degrades in
7 the body?

8 MR. HUTCHINSON: Objection.

9 THE DEPONENT: Yes, I do.

10 BY MR. ANDERSON:

11 Q. And if we could see Exhibit 23?

12 MR. HUTCHINSON: Ben, just for the
13 record that was a foundation objection.

14 BY MR. ANDERSON:

15 Q. From your review of all of the
16 records in this case, the internal documents that
17 you reviewed in this case, any depositions that
18 you reviewed, all of your work in the scientific
19 area of explanted transvaginal meshes and hernia
20 meshes, your analysis of over 300 explanted meshes
21 and speaking at conferences and mingling with
22 scientists around the world, are you aware of
23 anyone that has used some of those similar methods
24 to test if polypropylene degrades in the body,

1 including polarized light in high magnification?

2 MR. HUTCHINSON: Objection, compound
3 question.

4 THE DEPONENT: Yes, I am. I saw Ethicon
5 scientists did the same -- used the same
6 methodology.

7 BY MR. ANDERSON:

8 Q. Okay. So let's go to Exhibit 23.

9 ---PLAINTIFF EXHIBIT NO. 23: Internal
10 Ethicon Research Foundation document
11 dated March 23, 1983. Bates labelled
12 ETH.MESH.15955438 to ETH.MESH.15955439.

13 BY MR. ANDERSON:

14 Q. Is this something that you reviewed
15 in your work in this case?

16 A. Yes, I did.

17 Q. Is IT something you relied on in
18 forming your opinions in this case?

19 A. Yes, I did.

20 Q. Do you find it significant to your
21 opinions in this case?

22 A. Yes, I did.

23 Q. If we could highlight the top. Can
24 you just identify what this document is for the

1 record?

2 A. So this is internal document from
3 Ethicon Research Foundation dated March 23, 1983.

4 Q. And if you look at the top paragraph
5 what was the purpose of this study, Doctor? I'm
6 sorry, you need -- the top part needs to go down
7 all the way. Did you ask me to help you
8 prehighlight some of this, Doctor?

9 A. Yes, I did.

10 Q. And what's the subject line of this
11 study?

12 A. Prolene, in brackets
13 "polypropylene", Prolene is a brand name of
14 Ethicon for polypropylene.

15 Q. Is Prolene the type of polypropylene
16 that is in the TVT-O?

17 A. Yes, it is.

18 Q. And the TVT-O that's in Ms. Ramirez?

19 A. Body, yes it is.

20 Q. Now let's go to that top paragraph.
21 What were they doing in this internal Ethicon
22 study regarding Prolene microcracks?

23 A. They were studying specimens of
24 Prolene sutures which were explanted or retrieved

1 from humans.

2 Q. And what type of pathological
3 technique were they using, Doctor?

4 A. As you can see here they used light
5 microscopy, exactly the same what I did, and
6 polarized light to help identify the cracking.

7 Q. And if you can just scroll to where
8 we can see the center of this portion. Now, what
9 were -- what preservation method did the
10 pathologist use to preserve these Prolene
11 specimens?

12 A. The specimens were as normally
13 preserved in formalin.

14 Q. And then if we can just scroll down.
15 Why did you want to highlight this last paragraph?

16 A. They took photographs and they
17 showed their findings in the photographs.

18 Q. Okay.

19 A. And apparently at that time the
20 knowledge of Prolene or polypropylene cracking was
21 so prevalent that Ethicon formed a committee, the
22 committee was called "Prolene Microcrack
23 Committee" to study the degradation of
24 polypropylene.

1 Q. Okay. Let's go to next page of
2 Exhibit 23. Let's highlight first the left side,
3 top left side. Thank you.

4 Why is this significant to your
5 opinions, Doctor?

6 A. So these are the images in
7 transmitted light. You have to excuse me, this is
8 a black and white copy.

9 Q. I know they're not as pretty as the
10 ones we saw before but just explain what you can
11 see at least from the black and white copy?

12 A. They show exactly the same slices of
13 the mesh fibers, so they are cut like this.
14 Exactly the same way as I did for Ms. Ramirez's
15 specimen. And there is exactly the same bark.

16 Q. Okay.

17 A. Showing with the arrows.

18 Q. Okay.

19 A. And we can go to upper area here.

20 Q. Okay.

21 A. And it shows the bark around the
22 fibers in regular transmitted light.

23 Q. Now, on the right what do we have?
24 Is that the same images?

1 A. Then they use polarized light. The
2 same polarized light as I use and they used it 30
3 years ago. I was not aware of this document for a
4 long time. I started my study, research of
5 polypropylene degradation before I saw this
6 document. And I was pleased to see that it was
7 used 30 years ago. And these are the same fibers
8 in polarized light. You can see how they are
9 bright or birefringent.

10 And then if we go to enlarge the area
11 you can see some folding and some parts of the
12 bark with cracks. This is the same bark.

13 MR. HUTCHINSON: Move to strike as
14 nonresponsive.

15 BY MR. ANDERSON:

16 Q. And, Doctor, did you review any
17 other internal Ethicon documents where they
18 studied these microcracks through this Prolene
19 microcrack committee?

20 A. Yes, I did.

21 Q. Is this document significant to your
22 opinions in this case?

23 A. Yes, it is.

24 Q. And did you review and rely upon

1 them in informing your opinions?

2 A. Yes, I did.

3 Q. Can we please go to Exhibit 24? I'm
4 showing you what has been marked as Exhibit 24.

5 ---PLAINTIFF EXHIBIT NO. 24: Internal
6 document from Ethicon Research
7 Foundation dated May 2, 1984. Bates
8 labelled ETH.MESH.15955462 to
9 ETH.MESH.15955468.

10 BY MR. ANDERSON:

11 Q. And can you please identify that for
12 the record?

13 A. This is internal document from
14 Ethicon Research Foundation.

15 Q. Can you publish it and highlight the
16 top part, including the top third of the document?
17 Thank you.

18 A. The document dates May 2nd, 1984.

19 Q. So a year after the last document?

20 A. Yes, it's about a year.

21 Q. What's the subject here?

22 A. Examination of Prolene polypropylene
23 sutures from human cardiovascular explants.

24 Q. Okay.

1 A. So again the same materials,
2 polypropylene is explanted from human subjects.

3 Q. And under the summary of that what
4 were these explants preserved in before they were
5 examined?

6 A. So they were received to examine
7 surface cracking and tensile strength.

8 Q. What were they preserved in?

9 A. They were preserved in formalin.

10 Q. If we could go down do the next
11 paragraph that you've asked to be highlighted.
12 What's the significance of these highlighted
13 sentences?

14 A. So again they use the same methods,
15 histological methods examining histological slides
16 as I did for Ms. Ramirez, to examine them in
17 regular light, or cross-sections of the specimens
18 in regular light. And they used phloxine.

19 Q. What's phloxine, Doctor?

20 A. Phloxine is another histological
21 dye.

22 Q. Like the H&E or the S100?

23 A. Similar.

24 Q. Okay.

1 A. And they examined the specimens and
2 they saw severe surface cracking. And the bark
3 layer or the cracked layer was 3 to 4.5 microns.

4 Q. Let me ask you about that level of 3
5 to 4.5 microns. In your scientific research, and
6 all of the explanted meshes that you've analyzed,
7 is that the same or different in terms of 3 to 4.5
8 micron depth of the bark cracking?

9 A. It's the same. Well, they examine
10 small number. I examine over 300 so my numbers
11 are anywhere from 1 micron to 7 micron.

12 Q. So hypothetically, I want you to
13 assume with me there may be testimony in this case
14 where someone might say that the depths of these
15 cracks is so small it doesn't make any difference
16 to the patient. Do you have an opinion about
17 that?

18 A. I do.

19 Q. What's that opinion?

20 A. Well, first of all it -- entire
21 surface of the mesh is involved.

22 Q. What do you mean by "involved"?

23 A. Entire surface of the mesh is
24 degraded, is brittle and it's cracked. And second

1 point is that the size in pathology and in
2 medicine doesn't matter. For example, if we take
3 small structures like viruses they can be deadly,
4 like HIV virus or like Ebola virus. It's very
5 small but it can kill.

6 Q. Okay. Let's turn over if we could
7 now to page 3 of this document. If we can
8 highlight from number 6 -- yes, please.

9 Doctor, on page 3 of this document it
10 describes sample 6. And in the third -- in the
11 paragraph there in histological sections can you
12 please explain why this is significant to your
13 opinions?

14 A. So again they describe a cracked
15 surface layer measuring 3 to 4.5 microns thick.
16 The layer was birefringent or bright, as we
17 discussed earlier. When examined under polarized
18 light microscopy, exactly the same phenomenon as
19 we saw before, it is bright in polarized light.
20 Phloxine stain had completely penetrated the
21 cracked layer. Again, a different dye stains it
22 purple again. Different molecules of the dye,
23 different electrostatic charge. It still dyes it,
24 it still stains it.

1 Q. Okay. And the next part of that?

2 A. And particles of blue dye, those
3 blue granules were evident within the cracked
4 layer. So they saw exactly the same 30 years ago.
5 Those blue granules were in the bark in 1984.

6 Q. And just to be clear, in both the
7 1983 internal Ethicon Prolene crack study, and the
8 1984 Ethicon internal Prolene crack study not all
9 of those fibers were cracked, correct?

10 MR. HUTCHINSON: Objection, leading.

11 BY MR. ANDERSON:

12 Q. Were all of those fibers cracked?

13 A. No, not all of them were cracked.

14 Q. Just to be clear, Doctor, in both
15 the Ethicon 1983 Microcrack Committee study, and
16 the Ethicon 1984 Ethicon Microcrack Committee
17 study were all of those fibers cracked or
18 degraded?

19 A. Well, the report was that some of
20 them were not cracked or at least they did not see
21 cracking.

22 Q. Okay. And did these reports did
23 they determine whether or not the cracking was
24 time dependent? In other words, did they report

1 whether or not the longer the material was in the
2 body the more susceptible it was to cracking?

3 A. There was some information about
4 cracks, they are more prevalent in older or longer
5 in vivo period.

6 Q. Is that consistent with your
7 scientific research that you've done with regard
8 to degradation and the length of time that the
9 mesh was in the body?

10 A. Yes, it is.

11 Q. How so?

12 A. The bark layer starts really thin.
13 Well, it starts with zero from day one and then it
14 grows slowly. Over the years it becomes thicker
15 and thicker and thicker, and thicker.

16 Q. If we go down to the top page -- top
17 of the next page. At the top of page 4 of this
18 1984 study, plaintiff's Exhibit 24, why is that
19 significant to your opinions here, Doctor?

20 A. So this is their conclusion.

21 "The cracked layer appeared blue in
22 gross specimens and blue dye particles
23 were evident in histological sections
24 of the layer. This would indicate that

1 the layer is dyed Prolene polymer and
2 not an isolated protein coating on the
3 strands."

4 Q. Why is that significant to you,
5 Doctor?

6 A. These were exactly the same
7 conclusions as I independently arrived 30 years
8 after. Thirty years ago Ethicon scientists used
9 the same methods and they concluded that the
10 cracked layer is degraded polypropylene and not a
11 protein layer, not a biofilm.

12 Q. If we could go to page 6 of this
13 report? I want to highlight that top part.

14 Is this significant to your report here,
15 Doctor, the description of certain wet and dry
16 conditions?

17 A. Yes, it is.

18 Q. Can you please explain?

19 A. So when the surface of the cracked
20 fibers is dry it's much easier to see the cracks.
21 They are more dramatic in dry sample. When the
22 surface was wet it's not as easy to see the
23 cracks. So sometimes --

24 Q. Why is that?

1 A. Water just fills the cracks and you
2 don't see them.

3 Q. And if we turn to page 7 please.
4 What are we seeing in that upper image, Doctor?

5 A. This is a similar image we saw
6 before the polypropylene fiber is sectioned in
7 histological section and examined in polarized
8 light. And this part is the nondegraded core of
9 the fiber. And this layer, as you can see a
10 scaling layer, is degraded bark.

11 Q. And it says "birefringent", is that
12 that word that means brightly again?

13 A. Brightly, bright again. It's
14 phloxine staining, bright in polarized light,
15 degraded layer of polypropylene or Prolene.

16 Q. What are we seeing in the image just
17 below that if we could, Doctor?

18 A. And this is again a cross-section of
19 a fiber like this tree slab.

20 Q. Okay.

21 A. Cross-section. And we just see
22 quarter of it. And we see bark layer or
23 degradation layer on the outer surface. So in
24 this image it's in regular light, this part is the

1 core and this is degraded layer. And they use the
2 same arrows. I used the same arrows or similar
3 arrows 30 years after that.

4 Q. With my help did you prepare a slide
5 comparing the findings from these Ethicon
6 scientist and your findings from Ms. Ramirez's
7 explanted mesh?

8 A. Yes, I did.

9 Q. Do you think it would be helpful in
10 informing the jury or your opinions?

11 A. Yes, it will.

12 Q. Is it significant to your opinions
13 here?

14 A. Yes, it is.

15 Q. Okay. Let's pull up Exhibit 25
16 please. I'm showing you what's been premarked as
17 plaintiff's Exhibit 25 for demonstrative purposes
18 only.

19 ---PLAINTIFF EXHIBIT NO. 25: Two pages
20 depicting high magnification images for
21 comparison.

22 BY MR. ANDERSON:

23 Q. Please explain what we're seeing
24 here, Doctor?

1 A. This is a comparison of the Ethicon
2 study and the images I took from Ms. Ramirez's
3 specimen. The first combination of images shows
4 microphotographs taken 30 years ago by Ethicon
5 scientists studying Prolene sutures explanted from
6 people. And this image, or the image on lower
7 right shows Ms. Ramirez's specimen in polarized
8 light. And you can see the similarity. Bright
9 core, bright bark and then dark surrounding
10 tissue, dark surrounding tissue here.

11 Q. What do we see in the lower right
12 image, if you can blow that up please for me.

13 A. This is comparison of mesh fibers
14 examined in regular light. And you can see the
15 similarity. Mesh fiber with cracked outer bark or
16 cracked outer layer here in Ms. Ramirez's specimen
17 examined in 2015. And this is a mesh or Prolene
18 suture examined in 1984. And we can see the
19 similarity.

20 So this was drawn by Ethicon scientist
21 in 1984. This is the bark layer with the cracks.
22 And this is 2015, 30 years after that. These are
23 blue granules in the bark layer. This is Prolene,
24 it's not protein.

1 Q. Demonstrating what to you,
2 Dr. Iakovlev?

3 A. It demonstrates that Ethicon
4 scientists knew that Prolene degrades in the body
5 in 1984, and they determined that using exactly
6 the same methodology that I used to examine
7 Ms. Ramirez's specimen and determine that TVT-O
8 degraded while in the body of Ms. Ramirez.

9 Q. Thank you, you can take that down.
10 Doctor, as part of your evaluation in
11 this case did you rule out any other causes of the
12 scarring the foreign body type inflammation and
13 the nerve involvement in Ms. Ramirez's slide?

14 A. Yes, I did.

15 Q. What did you do to rule out all
16 other causes for these tissue changes as it
17 related to the TVT-O mesh in Ms. Ramirez?

18 A. I examined the specimen grossly, I
19 examined it microscopically and I saw no natural
20 disease like cancer. All pathological cases were
21 related to the mesh. My findings were exactly the
22 same in this respect as the findings of initial
23 pathologist.

24 Q. Doctor, based upon your background,

1 training and experience, your review of over 300
2 explanted meshes, your review of the medical
3 records of hundreds of explanted mesh patients,
4 your scientific publications, your review of the
5 literature and your review of Ms. Ramirez's
6 medical records, do you have an opinion, to a
7 reasonable degree of medical certainty, as to the
8 cause of Ms. Ramirez's pelvic pain?

9 A. Yes I do.

10 Q. And what is that opinion?

11 A. My opinion is --

12 MR. HUTCHINSON: Objection, foundation.

13 BY MR. ANDERSON:

14 Q. Go ahead?

15 A. As I said, there was no natural
16 disease, there was no other foreign body. All
17 pathology in the excised specimens, and the
18 specimens which were excised to treat the
19 complications was related to the mesh. And those
20 were bridging fibrosis, scar encapsulation, scar
21 plating, foreign body type inflammation, nerve
22 entrapment, and all of these changes caused
23 complications in Ms. Ramirez.

24 Q. And was that complication including

1 pelvic pain?

2 MR. HUTCHINSON: Objection, foundation.

3 THE DEPONENT: Yes.

4 BY MR. ANDERSON:

5 Q. And based upon all of your
6 background, training, experience, your scientific
7 work, your review of the medical records in this
8 case, do you have an opinion -- and you review of
9 thousands of other pages of medical records for
10 the hundreds of explants that you say you examined
11 as part of your work and your research, do you
12 have an opinion as to whether or not the TVT-O
13 mesh caused pain with sexual intercourse for
14 Ms. Ramirez?

15 MR. HUTCHINSON: Objection, foundation.

16 THE DEPONENT: Yes, I do.

17 BY MR. ANDERSON:

18 Q. What is that opinion?

19 A. My opinion is that the mesh and in
20 the mesh related changes in the tissue caused pain
21 with sexual intercourse for Ms. Ramirez.

22 Q. And do you have an opinion as to how
23 it caused pain for sexual intercourse?

24 A. Yes, I do.

1 MR. HUTCHINSON: Same objection,
2 foundation.

3 BY MR. ANDERSON:

4 Q. Go ahead

5 A. The mesh triggered tissue reaction.
6 The mesh degraded itself, it triggered bridging
7 fibrosis, scar encapsulation, scar plating,
8 foreign body type inflammation, nerve entrapment,
9 and all of these changes caused this complication.

10 Q. Do you have an opinion, to a
11 reasonable degree of medical certainty, based upon
12 your background, training, experience, your review
13 of over 300 explanted polypropylene meshes, your
14 publications in the field, your presentations at
15 conferences around the world, including invited
16 presentations to mesh manufacturers, your review
17 of the records in this case, and your review of
18 the explants, and all of your microscopic
19 analysis, do you have an opinion as to whether or
20 not the pathological analysis you've done has
21 shown that Ms. Ramirez's urinary symptoms were due
22 to TVT-O?

23 MR. HUTCHINSON: Objection, foundation.

24 THE DEPONENT: Yes, I do.

1 BY MR. ANDERSON:

2 Q. What is that opinion?

3 A. My opinion is that the sling and
4 sling-related tissue changes caused scarring, scar
5 contraction, tightening of the mesh and urinary
6 symptoms. As to how this tightening of the mesh
7 manifested in terms of urinary symptoms I would
8 defer this to urogynecologist.

9 Q. Doctor, with your help did you help
10 me prepare a slide for your clinico-pathological
11 findings as they relate to your opinion in
12 Ms. Ramirez's case?

13 A. I did.

14 Q. And for demonstrative purposes only
15 can you please pull up the slide? Doctor, can you
16 please explain the slide that you prepared here
17 for the jury regarding your summary of
18 pathological findings and your
19 clinico-pathological correlation?

20 A. So the main pathological abnormality
21 in the excised tissue, in the tissue which was
22 excised to treat the complications, was presence
23 of foreign body and that foreign body was the
24 mesh. There was no other foreign body.

1 Now, examining further the sling was
2 found curled or roped, which was correlating with
3 the clinical description of bow stringing. Making
4 a tight rope like a bow string. This was caused
5 by scarring and contraction within the curled
6 mesh.

7 Q. Okay. Next bullet point.

8 A. There was entrapment of nerves in
9 the scar and in the mesh which was correlated with
10 the pain.

11 Q. And the next bullet point?

12 A. There was also foreign body type
13 inflammation which was correlating with further
14 scarring and pain. The mesh itself was found to
15 be degraded. It was failing on its own.

16 Q. And your last bullet point, why is
17 that significant?

18 A. As important in pathology for all
19 specimens we examine, there was no natural
20 disease. There is no malignancy or nonmalignant
21 disease in the tissue. All changes were triggered
22 by the mesh.

23 Q. Doctor, do you have an opinion, to a
24 reasonable degree of medical certainty, based upon

1 your knowledge, training, experience, work as a
2 pathologist for over 15 years, your work on this
3 case reviewing the medical records of Ms. Ramirez,
4 all of the work that you've done in the field that
5 we've previously described, as to whether or not
6 these pathological changes in the tissue of
7 Ms. Ramirez, that you've just described, are
8 related to her clinical symptoms of chronic
9 vaginal pelvic pain, pain with intercourse and
10 urinary symptoms?

11 MR. HUTCHINSON: Objection, foundation.

12 THE DEPONENT: I do.

13 BY MR. ANDERSON:

14 Q. What is that opinion?

15 A. My opinion is that the mesh and
16 mesh-related changes in the tissue caused chronic
17 pelvic vaginal pain, pain with intercourse and
18 urinary symptoms for Mr. Ramirez.

19 Q. And do you have an opinion, based
20 upon your background, training, experience, and
21 all of your work in this case, as to whether or
22 not the pieces of mesh that are still in
23 Ms. Ramirez's body will continue to present a risk
24 for other complications and changes in her tissue?

1 A. I do.

2 Q. And what is that opinion?

3 MR. HUTCHINSON: Same objection,
4 foundation.

5 BY MR. ANDERSON:

6 Q. What is that opinion?

7 A. My opinion is that the remaining
8 parts of the TVT-O sling which still remain in
9 Ms. Ramirez's body will continue to cause all of
10 those changes, pathological changes I described
11 before, and will pose risk for pain for
12 Ms. Ramirez.

13 Q. For how long?

14 A. As long as mesh stays there. And
15 because there is still damaged tissue, scarring
16 left after the mesh in the area where it was
17 excised, and scarring left after the mesh
18 surgeries, that scar tissue also poses risk for
19 clinical complications.

20 MR. HUTCHINSON: Move to strike as
21 nonresponsive.

22 BY MR. ANDERSON:

23 Q. Thank you, Doctor, no further
24 questions.

1 A. Thank you.

2 THE VIDEOGRAPHER: Going off the record.

3 The time is 11:58 a.m.

4 --- Lunch break taken

5 THE VIDEOGRAPHER: Back on the record at

6 1:09 p.m.

7 CROSS-EXAMINATION BY MR. HUTCHINSON:

8 Q. Good afternoon, Dr. Iakovlev.

9 A. Good afternoon.

10 Q. My name is Chad Hutchinson and I
11 represent Ethicon and Johnson & Johnson in this
12 case and I'm going to need to ask you some
13 questions, okay?

14 A. Okay.

15 Q. You're a pathologist who works in
16 Canada, is that right?

17 A. That's correct.

18 Q. And I believe you told us earlier
19 this morning that you grew up in Russia?

20 A. That's correct.

21 Q. And you served in the Russian
22 military?

23 MR. ANDERSON: Objection.

24 THE DEPONENT: Yes, I did.

1 BY MR. HUTCHINSON:

2 Q. And we're in Canada right now, is
3 that right?

4 A. That's correct.

5 Q. Now, Dr. Iakovlev, the jury who is
6 watching this video is from Texas. You've never
7 practiced medicine in Texas have you?

8 A. No.

9 Q. You've never been to Texas?

10 A. Just in the airport.

11 Q. And, Doctor, you've been licensed to
12 practiced medicine in the State of Texas have you?

13 A. Not in the state of Texas.

14 Q. In fact, Doctor, let's be more
15 specific, you've never practiced medicine anywhere
16 in the United States have you?

17 A. That's correct.

18 Q. And you applied for a residency
19 program in the USA didn't you?

20 A. I applied to both, to Canada and
21 residency at the same time.

22 Q. That's correct. And you didn't get
23 in the USA did you?

24 A. That's not correct. I got into

1 pathology residency in Canada, because when the
2 match happens you can get only one spot.

3 Q. But you applied for a residency
4 program in the United States, is that correct?

5 A. That's correct.

6 MR. ANDERSON: Just show my objection to
7 this entire line of questions.

8 BY MR. HUTCHINSON:

9 Q. And you never participated in the
10 residency program in the United States, correct?

11 MR. ANDERSON: Objection.

12 THE DEPONENT: That's correct.

13 BY MR. HUTCHINSON:

14 Q. And, Dr. Iakovlev, I want to talk
15 about your history as an expert witness in the
16 mesh litigation. You've testified for the
17 plaintiffs against American Medical Systems, AMS,
18 is that right?

19 A. That's correct.

20 Q. And that's one company that makes
21 mesh?

22 A. That's correct.

23 Q. And you've testified for the
24 plaintiffs against Bard, is that correct?

1 A. That's correct.

2 Q. And that's another company that
3 makes mesh?

4 A. That's correct.

5 Q. And you've testified against Boston
6 Scientific haven't you?

7 A. I did.

8 Q. Another company that makes mesh?

9 A. That's correct.

10 Q. And now you're giving testimony
11 against Ethicon, is that right?

12 A. That's correct.

13 Q. In fact you've always testified for
14 the plaintiffs against any manufacturer of mesh
15 products, is that correct, sir.

16 A. I always testified for the patients.
17 I think it's natural for a doctor.

18 Q. And, Doctor, you charge \$475 an hour
19 for your time, is that correct?

20 A. That's correct.

21 Q. How many years have you been doing
22 this, Dr. Iakovlev?

23 MR. ANDERSON: Objection to form.

24 THE DEPONENT: Um, I became involved --

1 first I became involved in the mesh research in
2 2012. And then I became in mesh litigation,
3 without knowing this there is litigation. I was
4 just called to examine something for litigation in
5 2013.

6 BY MR. HUTCHINSON:

7 Q. So, Dr. Iakovlev, let me ask you
8 this. Since 2013 why don't you tell the jury how
9 much money in U.S. currency that you've made in
10 total from all the mesh work that you've done?

11 A. Um, I don't know for the 2015. Last
12 time --

13 Q. I'm sorry, move to strike as
14 nonresponsive. Dr. Iakovlev --

15 MR. ANDERSON: He's trying to give you a
16 summary and break it down.

17 MR. HUTCHINSON: I understand that.

18 BY MR. HUTCHINSON:

19 Q. But I need you to give me in total
20 how much money that you've made in U.S. currency
21 giving testimony against mesh manufacturers since
22 2013?

23 MR. ANDERSON: Objection.

24 MR. FREESE: Hold on a sec. Dr.

1 Iakovlev, you can answer the question. We're not
2 going to have the interruptions. You ask the
3 question, if you don't think it's responsive you
4 move to strike but we're not going to do this,
5 Chad.

6 MR. HUTCHINSON: That's exactly what I
7 did and he didn't answer the question.

8 MR. FREESE: No, you interrupted him.

9 MR. HUTCHINSON: No, I didn't.

10 MR. FREESE: Yes, you did. You
11 interrupted him. So you're going to ask the
12 question, the doctor is going to answer and then
13 you're either going to move on to another question
14 or you're going to move to strike as
15 nonresponsive. But you're not going to interrupt
16 the witness and he's not going to interrupt you.

17 MR. HUTCHINSON: I didn't interrupt the
18 witness.

19 MR. FREESE: Yes, you did. You
20 absolutely did.

21 BY MR. HUTCHINSON:

22 Q. Dr. Iakovlev, you can answer the
23 question.

24 A. I can only tell you up to 2014

1 because I've done taxes only for 2014. I haven't
2 done taxes for 2015 yet.

3 Q. Move to strike as nonresponsive.

4 Dr. Iakovlev, my question is since 2013
5 tell the jury how much money that you've made in
6 U.S. currency in total in all the mesh litigation
7 that you've been involved in.

8 MR. ANDERSON: Objection. Go ahead.

9 THE DEPONENT: That was my answer. I
10 can give you number only up to 2014.

11 BY MR. HUTCHINSON:

12 Q. You can't give us a number before
13 2014? Is that what you said?

14 A. I just became involved at the end of
15 2013. I didn't make -- I don't think I made much
16 or anything in 2013.

17 Q. But my question, Doctor -- move to
18 strike as nonresponsive. My question is, I want
19 to know in total how much money that you've
20 received in U.S. currency from being an expert in
21 the mesh litigation since 2013?

22 MR. ANDERSON: Objection. That's what
23 he's trying to tell you. He said he can tell you
24 only up to 2014 and you keep saying "in total".

1 And he says he doesn't know for '15. What part of
2 that didn't you understand?

3 BY MR. HUTCHINSON:

4 Q. Dr. Iakovlev, you can answer the
5 question?

6 MR. ANDERSON: Answer the question.

7 THE DEPONENT: I will just repeat it
8 again. I cannot give you total number. I can
9 give you total number up to the year I completed
10 my taxes.

11 BY MR. HUTCHINSON:

12 Q. And what year did you complete your
13 taxes?

14 A. 2014.

15 Q. And what is that amount up until
16 2014?

17 A. 170,000.

18 Q. Doctor, from 2014 until now, April
19 2016, you've made over a million dollars in U.S.
20 currency haven't you?

21 A. I don't think so. I don't know.

22 Q. You can't answer that question?

23 A. I can't answer that question.

24 Q. For the Ramirez case, Dr. Iakovlev,

1 how much time have you spent on the Ramirez case?

2 A. Um, you have my billing. It
3 describes everything.

4 Q. Move to strike as nonresponsive.

5 Dr. Iakovlev, how much time have you
6 spent on the Ramirez case?

7 A. I don't remember exact number of
8 hours. I mean, usually it takes about 20 hours
9 for me to make one expert report.

10 Q. Dr. Iakovlev, this morning you told
11 us that you were an anatomical pathologist, is
12 that correct?

13 A. That's correct.

14 Q. You're not a clinical pathologist
15 are you?

16 A. I'm not.

17 Q. You're not a biochemical pathologist
18 are you?

19 A. Well, clinical pathologist and
20 biochemical pathologist are the same thing. Usual
21 term for United States and Canada is clinical
22 pathologist or general pathologist.

23 Q. But you're not a biochemical
24 pathologist are you, Doctor?

1 A. As I said, we don't use that term,
2 biochemical pathologist.

3 Q. Doctor --

4 A. The correct term the clinical
5 pathologist and I'm not clinical pathologist.

6 Q. Who doesn't use the term
7 "biochemical pathologist"?

8 A. Pathologists.

9 Q. Okay. Doctor, I want to hand you
10 your deposition from the Jennifer Ramirez case.
11 You testified under oath, didn't you, in the
12 Jennifer Ramirez case, the case that we're here
13 about today?

14 A. That's correct.

15 Q. And, Doctor, if you'll turn to page
16 102, line 17. Page 102, line 17. Are you there
17 with me?

18 A. Yes, I am.

19 Q. It says, "I don't know. I'm not a
20 treating physician and I'm not a biochemical
21 pathologist." Did I read that correctly, sir?

22 A. You do.

23 Q. Those are your own words aren't
24 they?

1 A. I don't know. That's what
2 transcript said. I don't know if I said that
3 because it's not our usual term. It says clinical
4 pathologist.

5 Q. Dr. Iakovlev, are you telling the
6 jury that the transcript for the Jennifer Ramirez
7 case is wrong?

8 A. Could be because it's not our usual
9 term.

10 Q. Do you have any evidence,
11 Dr. Iakovlev, that Ms. Ramirez's transcript is
12 wrong?

13 MR. ANDERSON: Objection. Go ahead.

14 THE DEPONENT: No, I'm just that this is
15 not an accepted term. The subspecialties in
16 pathology are anatomical pathology and clinical
17 pathology.

18 BY MR. HUTCHINSON:

19 Q. And Dr. Iakovlev, did you sign the
20 errata sheet for your deposition?

21 A. For this transcript?

22 Q. Yes, sir.

23 A. I don't know.

24 Q. You had the opportunity to review

1 the accuracy of that deposition didn't you, sir?

2 MR. ANDERSON: Objection.

3 THE DEPONENT: Sometimes I do, sometimes
4 I don't. Sometimes I don't review the
5 transcripts.

6 BY MR. HUTCHINSON:

7 Q. Doctor, you're not a microbiologist
8 either are you?

9 A. That's correct.

10 Q. And you're not a urologist?

11 A. I'm not.

12 Q. And you're not a urogynecologist?

13 A. I'm not.

14 Q. Those are specialties outside of
15 your field. Is that correct, sir?

16 A. That's correct.

17 Q. And you don't treat or counsel
18 patients who have urinary symptoms like
19 Ms. Ramirez do you?

20 A. I don't.

21 Q. And you don't counsel or treat
22 patients who have dyspareunia do you?

23 A. I don't.

24 Q. And you don't prescribe medicine for

1 pelvic pain do you, Dr. Iakovlev?

2 A. I don't.

3 Q. And you don't implant mesh do you,
4 sir?

5 A. I don't.

6 Q. And you don't explant mesh do you,
7 sir?

8 A. I don't.

9 Q. I want to talk specifically about
10 Ms. Ramirez for a minute. Okay?

11 A. Okay.

12 Q. Now, you know she received a TVT-O
13 product in September of 2010, is that right?

14 A. That's correct.

15 Q. And you don't know whether her
16 incontinence was cured or fixed by the TVT-O do
17 you?

18 A. Well, that's not what purpose of my
19 expert opinion. I'm not here to testify on the
20 efficacy of the device.

21 Q. Move to strike as nonresponsive.

22 Doctor, my question is you don't know
23 whether Ms. Ramirez's incontinence was corrected
24 by the TVT-O do you, sir?

1 A. I don't.

2 Q. And you haven't examined Ms. Ramirez
3 have you?

4 A. No, I have not.

5 Q. You haven't read her deposition have
6 you?

7 A. I have not.

8 Q. You haven't talked with her have
9 you?

10 A. I have not.

11 Q. And you haven't talked with any of
12 Ms. Ramirez's treating doctors have you?

13 A. That's correct.

14 Q. So as I understand it you're basing
15 your opinions on the medical records and your
16 examination of the explant, is that right?

17 A. That's correct.

18 Q. Let's talk about the medical records
19 for just a minute. You asked for all of her
20 medical records didn't you?

21 A. Yes, I did.

22 Q. And then you wrote a report?

23 A. Well, I examined the specimen as
24 well after I went through the records.

1 Q. Doctor, I want to hand you the
2 report that you've done for Jennifer Ramirez and
3 we'll mark it as defendant's Exhibit 1.

4 ---DEFENSE EXHIBIT NO. 1: Expert
5 report of Dr. Vladimir Iakovlev re.
6 Jennifer Ramirez, dated April 24, 2015.

7 BY MR. HUTCHINSON:

8 Q. That's a copy of your report that
9 you did for Jennifer Ramirez isn't it, sir?

10 A. Yes, it is.

11 Q. And your report includes a summary
12 of clinical records, is that right?

13 A. Yes.

14 Q. And your summary doesn't say
15 anything about Ramirez -- Ms. Ramirez having
16 dyspareunia before September of 2010, does it?

17 A. Just give me a second and I'll go to
18 the summary.

19 Q. Doctor, I'm going to help you out,
20 it's on the first page of your case-specific
21 report.

22 A. I found it. This is my summary.

23 Q. That's correct. And your summary
24 doesn't say anything about Ms. Ramirez having

1 dyspareunia before September of 2010 does it, sir?

2 A. No, it doesn't.

3 Q. And you can't tell us what you did
4 to rule out any pre-existing dyspareunia can you,
5 sir?

6 A. Yes, I can.

7 Q. Dr. Iakovlev, I want you to look at
8 your deposition again.

9 A. Yes.

10 Q. Page 96, line 5.

11 A. I do.

12 Q. And it says, "As we sit here right
13 now", and by the way, Dr. Iakovlev, you understand
14 you're under oath right now don't you?

15 A. I do.

16 Q. And you understand you were under
17 oath at the time you gave testimony in
18 Ms. Ramirez's case didn't you?

19 A. I do.

20 Q. And it says, "As we sit here now you
21 can't tell me what you do to rule out her
22 pre-existing dyspareunia?" And your answer is,
23 "That's not my job." Did I read that correctly?

24 MR. ANDERSON: No. Objection. You have

1 to read the entire answer.

2 MR. HUTCHINSON: I'm not finished yet

3 MR. ANDERSON: You said, "Did I read
4 that correctly?"

5 BY MR. HUTCHINSON:

6 Q. Are you following me, Dr. Iakovlev?

7 A. I'm following you but I have to read
8 the whole sequence of questions before I answer
9 you.

10 Q. Fine. Dr. Iakovlev, are you
11 finished?

12 A. Not yet.

13 Q. Are you finished Dr. Iakovlev?

14 A. Yes, I'm finished.

15 Q. Dr. Iakovlev, that wasn't your job
16 to rule out pre-existing dyspareunia was it?

17 A. Okay. Let me read the entire
18 paragraph. I would have to look --

19 Q. Excuse me, I'm going to move to
20 strike as nonresponsive.

21 MR. FREESE: You're doing what I just
22 asked you not to do.

23 MR. ANDERSON: You cannot interrupt him.

24 MR. HUTCHINSON: No, I'm not.

1 MR. FREESE: He's speaking.

2 BY MR. HUTCHINSON:

3 Q. My question is very simple.

4 MR. FREESE: We're going to --

5 MR. HUTCHINSON: My question is if he
6 was finished or not.

7 MR. FREESE: Chad, we're going to be
8 civil with each other and we're going to go by the
9 rules. He was speaking and you interrupted him.
10 He is going to answer the question the best way he
11 can. You then can move to strike or not. Go
12 ahead, Doctor. If you want to withdraw the
13 question and ask it again and let him answer
14 that's fine.

15 BY MR. HUTCHINSON:

16 Q. My question is, Dr. Iakovlev, are
17 you finished reading your deposition testimony?

18 A. Those two pages?

19 Q. Yes. Are you finished reading them?

20 A. Yes, I finished.

21 Q. Dr. Iakovlev, it wasn't your job to
22 rule out pre-existing dyspareunia was it?

23 A. So I will read you my answer that I
24 gave at the deposition.

1 "That is not my job. My job is to
2 examine the pathology so the clinician
3 who worked up the patient, their
4 decision was to remove the source of
5 pain. And they identified source of
6 pain in the mesh area. When I received
7 the specimen there was nothing wrong.
8 The only abnormality was mesh and
9 tissue reaction to foreign body. The
10 mesh itself was a disease in that
11 specimen."

12 Q. Move to strike everything after
13 "that's not my job".

14 Dr. Iakovlev, you don't know whether
15 Ms. Ramirez had vaginal infections before 2010 do
16 you?

17 A. I don't remember now. If it was in
18 the record I probably saw it but as I said, my
19 focus and excised specimen.

20 Q. And, Doctor, you don't know whether
21 Ms. Ramirez had urinary tract infections before
22 2010 do you?

23 A. I don't remember now. Probably she
24 had. People have them.

1 Q. And you don't know whether
2 Ms. Ramirez had any type of pelvic pain before
3 2010 do you?

4 A. I do. She had some pelvic pain
5 related to her benign tumors in the uterus, and
6 she had pain from menstrual periods.

7 Q. And -- I'm sorry. Were you
8 finished?

9 A. That's why the uterus was removed.

10 Q. Doctor, I want to hand you what
11 we'll mark as defense Exhibit 2 to your
12 deposition.

13 ---DEFENSE EXHIBIT NO. 2: Medical
14 report from Baptist Health System re.
15 Jennifer Galindo dated 1/21/2015.
16 Bates labelled RAMIREZJ_BAHSY_MDR00564.
17 BY MR. HUTCHINSON:

18 Q. You've seen this record before
19 haven't you, sir?

20 A. Yes, I have.

21 Q. And if we look at the middle where
22 it says, "Chief complaint, very heavy menstrual
23 periods. Pelvic pain." Did I read that
24 correctly, sir?

1 A. That's correct. That's what I just
2 said.

3 Q. And this medical record shows that
4 Ms. Ramirez had pelvic pain before she received
5 the TVT-O. Is that correct, sir?

6 A. That's correct.

7 Q. And, Doctor, you don't know if
8 Ms. Ramirez had multiple exams after she received
9 the TVT-O where she didn't complain of pain, do
10 you?

11 A. Yeah, she had some periods when
12 there was no pain.

13 Q. And, Doctor, before Ms. Ramirez
14 received the TVT-O she also had another device
15 called an Essure device implanted, is that
16 correct?

17 A. That's correct.

18 Q. That's just basically another type
19 of implant that she received in her pelvic area,
20 is that right?

21 MR. ANDERSON: Objection.

22 THE DEPONENT: Yes, it was coils
23 implanted in the uterus.

24

1 BY MR. HUTCHINSON:

2 Q. And you don't know what the Essure
3 device was made of do you?

4 A. It's metal.

5 Q. You don't know the type of metal do
6 you?

7 A. I don't know the specific type of
8 metal.

9 Q. And you don't know the rate of
10 pelvic pain associated with this metal device in
11 her pelvic area do you?

12 A. No, I don't know the exact
13 percentage.

14 Q. And, Doctor, there will always be a
15 foreign body response to any implant in the body,
16 is that correct?

17 A. Yes, it will be variable but there
18 will be always a foreign body response.

19 Q. That would include a medical -- a
20 metal, M-E-T-A-L, I'm sorry, metal object wouldn't
21 it?

22 A. Yes, it will.

23 Q. And it would include a TVT-O product
24 wouldn't it, sir?

1 A. It would.

2 Q. Now, let's talk about Ms. Ramirez's
3 treating doctors for a minute. Dr. Reyes, he was
4 the doctor who implanted the TVT-O, is that right?

5 A. The document is not complete.

6 Q. I'm not asking you a question about
7 that document. I'm asking you whether or not you
8 know the name of the doctor who implanted the TVT
9 device in Ms. Ramirez?

10 A. I don't remember all names. I mean,
11 I review so many records I just don't want to
12 guess. I want to read it from the record.

13 Q. Did you ever make an effort to find
14 out the name of the doctor who implanted the TVT
15 device in Ms. Ramirez?

16 MR. ANDERSON: Objection.

17 THE DEPONENT: Of course. I review the
18 record I see what's the name of the physician but
19 I don't want to guess. I want to have records in
20 front of me and read it from the record.

21 BY MR. HUTCHINSON:

22 Q. And with you can't tell us that
23 specific name now can you?

24 MR. ANDERSON: Same objection.

1 THE DEPONENT: Same answer.

2 BY MR. HUTCHINSON:

3 Q. Is it a yes or no? Can you tell us
4 the name of the doctor who implanted the TVT-O
5 device in Ms. Ramirez?

6 A. I don't want to guess. I want to
7 have record in front of me.

8 Q. Is that a no?

9 A. That was my answer.

10 Q. Doctor, you didn't read any of the
11 doctor depositions from Ms. Ramirez, did you?

12 A. That's correct.

13 Q. And you don't know what the
14 implanting doctor said about how the sling was
15 placed, do you?

16 A. Well, I can see what was in the
17 record at the time of implantation.

18 Q. But my question is you don't know
19 what the implanting doctor said in his deposition
20 about where the sling was placed, do you?

21 A. Not in deposition. Deposition
22 happened years after implantation.

23 Q. And you don't know what
24 Ms. Ramirez's doctors said in their deposition

1 about whether or not the mesh curled, do you?

2 A. I don't know what was said.

3 MS. VERBEEK: Objection to form.

4 MR. ANDERSON: She objected.

5 BY MR. HUTCHINSON:

6 Q. And let's talk about Dr. Graham. He
7 was the doctor that did the revision surgery, is
8 that correct?

9 A. Again, I don't want to guess. I
10 want to have excision operative report.

11 Q. Can you tell us the name,
12 Dr. Iakovlev, of the doctor who did Ms. Ramirez's
13 revision surgery?

14 MR. ANDERSON: Counsel, objection. As a
15 matter of fairness if you want him to talk about
16 the records put the records in front of him and
17 stop the guessing game. We want to get to what he
18 knows. Just put the records in front of him.

19 MR. HUTCHINSON: Your objection is
20 noted.

21 MR. ANDERSON: Well, objection. It's
22 not -- it's fundamental fairness. If you don't
23 know and you don't have a memory game of
24 everything in the records you can tell him that.

1 THE DEPONENT: I don't want to play
2 memory game or I don't want to guess. If we
3 discuss the record I want to have record in front
4 of me.

5 BY MR. HUTCHINSON:

6 Q. And, Doctor, do you know when the
7 doctor who did the revision surgery took out a 1
8 centimeter piece of mesh?

9 A. Again, I would like to see the
10 explanting operative report. If we want to
11 discuss specific details of the surgery I need to
12 see the record.

13 Q. And Doctor, if the record shows that
14 on December 22nd, 2010, that some mesh was
15 explanted would you have any reason to dispute
16 that?

17 MR. ANDERSON: Same objection.

18 THE DEPONENT: Same objection. If you
19 want to have specific numbers, specific dates,
20 specific names I want to see the original record.

21 BY MR. HUTCHINSON:

22 Q. Doctor, you didn't review the
23 pathology from December of 2010, did you?

24 A. You mean specimen?

1 Q. Yes.

2 A. I believe there was no specimen, no
3 pathological examination.

4 Q. And you didn't read what Dr. Graham
5 said about where or how the sling was placed in
6 Ms. Ramirez, did you?

7 A. You mean I did not read it in
8 medical records or I did not --

9 Q. No, the deposition.

10 MR. ANDERSON: Objection. Go ahead.
11 Asked and answered.

12 THE DEPONENT: I told you I don't review
13 depositions.

14 BY MR. HUTCHINSON:

15 Q. And you don't know what Dr. Graham
16 said about whether or not the mesh curled do you,
17 sir?

18 MR. ANDERSON: Objection.

19 THE DEPONENT: I gave you an answer. I
20 review what is in the records. I don't review
21 depositions.

22 BY MR. HUTCHINSON:

23 Q. Dr. Zimmern, he was another doctor
24 that did a surgery wasn't he?

1 A. Yes, he was.

2 Q. And you remember his name but you
3 don't remember the other doctor's names. Is that
4 fair to say?

5 MR. ANDERSON: Same objection.

6 THE DEPONENT: Again, if we want to go
7 to specific surgeries, to specific date, specific
8 names I would like to see the record in front of
9 me.

10 BY MR. HUTCHINSON:

11 Q. And, Doctor, you know that Dr.
12 Zimmern took out mesh in March of 2015, is that
13 right?

14 MR. ANDERSON: Objection.

15 THE DEPONENT: I want to see the record.
16 If we're discussing specific procedure I need to
17 see the medical record.

18 BY MR. HUTCHINSON:

19 Q. Okay. And, Doctor, you looked at an
20 explant that was taken out of Ms. Ramirez didn't
21 you?

22 A. Yes, I did.

23 Q. And do you know the date that the
24 explant was taken out of Ms. Ramirez?

1 A. It was March 2015. Exact day, again
2 I would have to check with my -- so it was March
3 10th, 2015.

4 Q. And you never saw the mesh when it
5 was in Ms. Ramirez's body did you, sir?

6 A. No.

7 Q. And if Dr. Zimmern testified under
8 oath that the mesh was flat when he took it out
9 you'd disagree with him wouldn't you?

10 MR. ANDERSON: Objection.

11 THE DEPONENT: One part was definitely
12 not flat. That's how it works in medicine,
13 treating physicians they have their opinions but
14 pathologists can find something else. I mean,
15 otherwise we wouldn't be employed in the hospital.
16 We wouldn't be needed.

17 BY MR. HUTCHINSON:

18 Q. Move to strike as nonresponsive.

19 My question, Doctor, if Dr. Zimmern
20 testified under oath that the mesh was flat when
21 he took it out you'd disagree with him wouldn't
22 you?

23 MR. ANDERSON: Objection to form. Asked
24 and answered. Go ahead.

1 THE DEPONENT: I would and it's a pretty
2 common situation when pathologists disagree on
3 some points with the clinicians.

4 BY MR. HUTCHINSON:

5 Q. And if Dr. Zimmern testified there
6 was no evidence of fraying or curling you'd
7 disagree with him wouldn't you, sir?

8 MR. ANDERSON: Same objection.

9 THE DEPONENT: I would.

10 BY MR. HUTCHINSON:

11 Q. Is that a yes?

12 A. Yes, I would disagree with him.

13 Q. And you don't know if photographs
14 that were taken of the mesh out of Ms. Ramirez's
15 surgery -- strike that.

16 Dr. Iakovlev, you don't know if
17 photographs were taken of the mesh after her
18 surgery do you?

19 A. No, I don't remember seeing them.
20 Maybe they were in the records, maybe not. I
21 don't remember them.

22 Q. But you never looked at the
23 photographs did you?

24 A. I could have. But I had my

1 specimen, my own specimen and I examined it
2 grossly, I examined it microscopically.

3 Q. And you don't know if there was an
4 ultrasound take of the mesh when it was in her
5 body do you, sir?

6 A. I think it was taken at one point.

7 Q. And you never looked at the
8 ultrasound did you, sir?

9 A. Ultrasound pictures or ultrasound
10 report?

11 Q. No, the ultrasound pictures. That's
12 something that you never reviewed, is that
13 correct?

14 A. Again, if they were in the records I
15 probably saw them. Well, I definitely saw
16 everything which was in the records but I'm not a
17 radiologist and I don't normally look at them in
18 my day-to-day practice.

19 Q. But if there were an ultrasound that
20 you remember you couldn't interpret it could you?

21 A. I can interpret it to a degree, not
22 as well as a radiologist but I can interpret some.

23 Q. Doctor, I want to hand you what
24 we'll mark as Exhibit 3 to your deposition.

1 ---DEFENSE EXHIBIT NO. 3: Patient
2 record from UT Southwestern Medical
3 Center re. Jennifer Ramirez, printed on
4 4/6/2015. Bates labelled
5 RAMIREZJ_UTSMC_MDR00311.

6 BY MR. HUTCHINSON:

7 Q. But before we go there your
8 specialty is not reviewing ultrasounds, is that
9 correct?

10 A. No, that's correct. I am not
11 reviewing ultrasounds.

12 Q. Are you on Exhibit 3 with me?

13 A. Yes, I am.

14 Q. And this is the biopsy, surgical
15 specimen report that we have in front of you, is
16 that right?

17 A. That's correct.

18 Q. This was part of the documents you
19 reviewed in forming your opinions, is that right?

20 A. That it is.

21 Q. And this was a document prepared by
22 the doctors who saw Ms. Ramirez over in Texas, is
23 that right?

24 MR. ANDERSON: Objection.

1 THE DEPONENT: Well it is a pathology
2 report.

3 BY MR. HUTCHINSON:

4 Q. Pathologists are doctors aren't
5 they, sir?

6 A. Yes, but they don't see patients.
7 At least most of the patients are not seen by
8 pathologists when they examine the specimens.
9 Sometimes we do see patients but most of the time,
10 and I believe for that specific case the
11 pathologist did not see Ms. Ramirez.

12 Q. And, Doctor, let's look under "Final
13 Pathologic Diagnosis"?

14 A. Yes.

15 Q. Of what the doctors from the UT
16 Southwestern Medical Center found. Are you there
17 with me?

18 A. Yes, I am.

19 Q. They didn't find any degradation did
20 they?

21 A. No, they didn't examine it.

22 Q. And they didn't find any particle
23 loss did they?

24 A. They didn't examine for degradation

1 or particle loss.

2 Q. In fact these doctors from Texas
3 didn't find any mesh deformation did they, sir?

4 A. There is no description of
5 deformation or nondeformation.

6 Q. And, Doctor, I want to hand you what
7 we'll mark as Exhibit 4 to your deposition.

8 ---DEFENSE EXHIBIT NO. 4: Surgical
9 pathology report from St. Michael's
10 Hospital re. Jennifer Ramirez dated
11 10/5/2015.

12 BY MR. HUTCHINSON:

13 Q. You did your own surgical
14 pathological report here in Canada for Ms.
15 Ramirez, didn't you, sir?

16 A. That's correct.

17 Q. And this is a copy of it?

18 A. Yes, it is.

19 Q. And under "Final Diagnosis" there in
20 the middle, are you there with me?

21 A. Yes.

22 Q. You didn't find any degradation
23 under your final diagnosis for Ms. Ramirez did
24 you, sir?

1 A. I think that's incorrect.

2 Q. Doctor, will you show the jury --
3 hold this up and publish it to the jury please?

4 MR. ANDERSON: Objection.

5 BY MR. HUTCHINSON:

6 Q. I'm sorry, I'm still working on my
7 question. Dr. Iakovlev, you didn't find that
8 there was any degradation from Ms. Ramirez's mesh
9 in your final diagnosis did you, sir?

10 A. Yes, I did. That's what it says.
11 "Surgical knitted monofilament mesh with
12 associated tissue changes. Please see synoptic
13 data for details." Then details expand and the
14 degradation layer is described there and it's
15 measured on the second page.

16 Q. Doctor, you didn't find any particle
17 loss for Ms. Ramirez did you?

18 A. Not visible large particles, that's
19 correct. I could not examine for smaller
20 particles which I could not see, but I could not
21 rule them out.

22 Q. And in fact, Doctor, you took 19
23 photographs of Ms. Ramirez's mesh, is that
24 correct?

1 A. Possible.

2 Q. Or specimen?

3 A. I don't remember how many pictures I
4 took.

5 Q. Well, why don't you look at your
6 report. Your report includes 19 pictures labelled
7 JR(1) through JR(19). Is that correct, sir?

8 A. Yeah, except some of them combine
9 too so it's over 19.

10 Q. Over 19, is that right?

11 A. At least 19, yes.

12 Q. And none of these 19 pictures show
13 any particle loss from the mesh. Is that correct,
14 sir?

15 A. That's correct. No visible particle
16 loss. I mean, it has to be visible in order for
17 me to see in the microscope. If it's smaller than
18 what can be seen then I cannot detect them.

19 Q. Move to strike everything after
20 other than, yes, "that's correct".

21 MR. ANDERSON: He answered your
22 question.

23 BY MR. HUTCHINSON:

24 Q. And, Dr. Iakovlev, you're not

1 telling the jury that there are any loose
2 particles from the mesh in Ms. Ramirez's tissue,
3 are you?

4 MR. ANDERSON: Objection, asked and
5 answered.

6 THE DEPONENT: I did not show it in the
7 specimen.

8 BY MR. HUTCHINSON:

9 Q. And in fact, Doctor, you don't know
10 if Ms. Ramirez's mesh was mechanically cut or
11 laser cut, do you?

12 A. No, I don't.

13 Q. And, Doctor, let's look at Exhibit
14 4(B)?

15 A. You mean 4(B) from my --

16 Q. From your direct examination. I'm
17 going to ask that you show it up on the screen
18 please. Exhibit 4(B).

19 A. Yes.

20 Q. This is some of the light microscopy
21 work that you did for Ms. Ramirez's mesh, is that
22 right?

23 A. No, this is not right.

24 Q. This is Ms. Ramirez's mesh explant

1 isn't it, sir?

2 A. That's correct.

3 Q. And in fact you can't tell us which
4 piece of mesh would have come out of her left side
5 or right side, can you?

6 A. Yes, I can.

7 Q. Doctor, I want to hand you your
8 deposition transcript and direct your attention to
9 page 53, line 7. Are you there with me
10 Dr. Iakovlev?

11 A. Yes. Let me read the page and then
12 we will come back to it.

13 Q. Have you finished reading it,
14 Dr. Iakovlev?

15 A. Yes, I did.

16 Q. And, Dr. Iakovlev, you raised your
17 right-hand and promised to tell the truth on this
18 time didn't you?

19 MR. ANDERSON: Objection. You've
20 already asked and answered if he knew he was under
21 oath. He said he was under oath did. Stop
22 beating him up. Don't answer the question.

23 BY MR. HUTCHINSON:

24 Q. Dr. Iakovlev, are you refusing to

1 answer that question.

2 MR. FREESE: Yes, he's being instructed
3 not to answer it. It's argumentative and he
4 understands he's under oath.

5 BY MR. HUTCHINSON:

6 Q. Dr. Iakovlev, page 53, line 7 it
7 says:

8 "As we sit here today you cannot tell
9 us which piece of the explant would go
10 in the left-hand side or in the middle
11 side?

12 "ANSWER: Not from what I have in the
13 specimen. I mean, if clinically there
14 was some other studies it could explain
15 that. It would be hard. Also I don't
16 know if it was divided before."

17 Did I read that correctly, sir?

18 MR. ANDERSON: Objection. Inappropriate
19 impeachment. That is a different question than
20 you just asked him before so it's an unfair
21 re-reading.

22 MR. HUTCHINSON: No it's not.

23 MR. ANDERSON: Yeah, it is. It's an
24 inappropriate way to impeach him.

1 BY MR. HUTCHINSON:

2 Q. Dr. Iakovlev --

3 MR. ANDERSON: If you want to ask him a
4 question that's just like that question then
5 that's fine. That's a different question and you
6 know it.

7 BY MR. HUTCHINSON:

8 Q. Dr. Iakovlev, did I read that
9 question and answer correctly, sir?

10 A. You did not read the complete
11 answers but you read that part. Because there is
12 an answer I just gave before that, you repeated
13 the question during deposition. And my -- can I
14 answer that?

15 MR. ANDERSON: Yes.

16 THE DEPONENT: So my answer was it would
17 be difficult to determine with certainty. So I
18 would need -- and then there is explanation.
19 Clinically there were some other studies it could
20 explain that. So combining clinical information
21 and my pathological I can tell you which one is
22 left and which 1 is right, but if I don't have
23 clinical information just pathology it would be
24 difficult for me.

1 BY MR. HUTCHINSON:

2 Q. Move to strike as nonresponsive.

3 Doctor, let's look at the photographs
4 that you took labelled J(1) through J(5).

5 MR. ANDERSON: What are you referring
6 to?

7 MR. HUTCHINSON: In your expert report.

8 MR. ANDERSON: You mean in defendant's
9 Exhibit 1.

10 MR. HUTCHINSON: Correct.

11 BY MR. HUTCHINSON:

12 Q. Are you there, Dr. Iakovlev?

13 A. Yes, I am.

14 Q. You can't tell us whether the mesh
15 was curling at the time it was taken out can you,
16 sir?

17 A. I can.

18 Q. I'm sorry?

19 A. I can. It was curled inside the
20 body.

21 Q. Dr. Iakovlev, let's look back at
22 your deposition. And by the way, before we do
23 that, you can't tell the jury whether the mesh was
24 curling at the time it was implanted can you?

1 A. No, I cannot tell that. It curled
2 sometime in the body.

3 Q. But you can't tell us whether or not
4 it curled at the time it was taken out can you?

5 MR. ANDERSON: Objection, asked and
6 answered.

7 THE DEPONENT: What do you mean? It was
8 curled only during excision not while it was in
9 the body? I can tell you it was curled up before
10 the scar tissue could grow into the curl. This is
11 very obvious in the images. It curled up in the
12 body and the lumen inside the curl was filled with
13 the scar tissue. This can happen only in the
14 body. This cannot happen during the excision.
15 You cannot make scar grow inside the mesh during
16 the excision.

17 BY MR. HUTCHINSON:

18 Q. Move to strike as nonresponsive.

19 Dr. Iakovlev, you cannot say whether the
20 curling occurred at the time of implantation or
21 post implantation, can you?

22 MR. ANDERSON: Objection to form.
23 Compound, asked and answered and form.

24 MS. VERBEEK: Same objection.

1 THE DEPONENT: As I told you I cannot.

2 MR. HUTCHINSON: Why don't we take a
3 quick break.

4 THE VIDEOGRAPHER: Going off the record
5 at 1:48 p.m.

6 --- Break taken.

7 THE VIDEOGRAPHER: We're back on the
8 record at 1:55 p.m.

9 BY MR. HUTCHINSON:

10 Q. Dr. Iakovlev, let's talk about
11 nerves for a minute okay?

12 A. Okay.

13 Q. And the TVT-O would have gone
14 through Ms. Ramirez's transobturator space, is
15 that correct?

16 A. That's correct.

17 Q. And nerves come in different shapes
18 and they come in different sizes?

19 A. I'm not sure about shape but, yes,
20 they have different caliber. The trunk starts
21 thicker and the branches branch off. They are
22 thinner and thinner and everything gets thinner
23 and thinner.

24 Q. Doctor, you didn't count the nerve

1 density for Ms. Ramirez did you?

2 A. It's not needed for my opinions.

3 Q. Move to strike as nonresponsive. My
4 question is asking for a yes or no please.

5 Dr. Iakovlev, you didn't count the nerve
6 density for Ms. Ramirez did you, sir?

7 A. Because it was not required for my
8 opinions I did not count it.

9 Q. Move to strike everything after "I
10 did not" -- I mean, before "I did not count it".

11 Dr. Iakovlev, in fact you didn't consult
12 with a neuropathologist regarding Ms. Ramirez's
13 case, did you?

14 A. I didn't need to.

15 Q. And, Doctor, if we look at Exhibit
16 4, which is the report that you created in Canada,
17 are we on the same page?

18 MR. ANDERSON: Objection to form.

19 THE DEPONENT: Yes, we are.

20 BY MR. HUTCHINSON:

21 Q. Doctor, look at the bottom for me
22 please. It says "synoptic diagnosis". Did I read
23 that correctly?

24 A. Yes, you did.

1 Q. And in fact under synoptic diagnosis
2 it says, "Acute inflammation: No." Did I read
3 that correctly?

4 A. Yes, you read it correctly.

5 Q. And it says, "Nerve branch
6 count/tissue area."

7 A. That's correct.

8 Q. And then under that it says, "All
9 tissue". Do you see that?

10 A. Yes, I do.

11 Q. And, Doctor, you write, "Cannot do
12 formal count in a limited specimen."

13 A. That's correct.

14 Q. Did I read that correctly?

15 A. Yes, you did read it correctly.

16 Q. In fact, Doctor, you have not
17 identified any nerve receptors in Ms. Ramirez's
18 slides have you?

19 A. Are we now switching from nerves to
20 nerve receptors?

21 Q. That's correct.

22 A. Because I was not looking for
23 receptors I was looking for nerves. There are no
24 nerves without receptors, or most of them will

1 have receptors. The only time they don't have
2 receptors is when they end up with traumatic
3 neuroma.

4 Q. And Doctor, you'll agree that pain
5 receptors are usually just bare endings of nerves,
6 is that correct?

7 A. Most of them are.

8 Q. And those are called nociceptors, is
9 that correct?

10 A. That's another term for pain
11 receptors.

12 Q. Am I correct, Doctor?

13 A. You're correct.

14 Q. You need a stain to detect a
15 nociceptor don't you, sir?

16 A. You need to stain for anything in
17 histology. So you need to stain specifically for
18 anything.

19 Q. And in fact the specific chemical
20 that you need to use to stain for a nociceptor is
21 something called PGP9.5. Is that correct, sir?

22 A. One of it. It can be used for a
23 nerve -- for axons.

24 Q. And you showed the jury a lot of

1 slides from Ms. Ramirez this morning, didn't you,
2 sir?

3 A. Yes, I did.

4 Q. And you didn't stain one of those
5 with PGP9.5 stain did you, sir?

6 A. Well, I use neurofilament it's
7 almost the same stain. It stains the same
8 structures.

9 Q. Move to strike as nonresponsive.

10 MR. ANDERSON: Well. He answered your
11 question.

12 BY MR. HUTCHINSON:

13 Q. My question, sir, is that you didn't
14 stain any of Ms. Ramirez's slides with the stain
15 PGP9.5. Yes or no?

16 A. Well, sounds like you're teaching me
17 pathology what I should and what I should not have
18 used. I used neurofilament which is similar stain
19 to PGP, this will answer. But I did not use
20 PGP9.5.

21 Q. Move to strike everything before "I
22 did not use PGP9.5".

23 In fact, Doctor, you can't look at a
24 nerve on a slide and tell whether or not it's

1 causing pain can you?

2 A. As I said, most of the nerves are
3 mixed therefore most of the nerves deliver or
4 conduct pain signals. So when I look at a nerve,
5 any nerve in the body, to a reasonable degree of
6 medical certainty, it does conduct pain signals.

7 Q. You can only estimate the
8 probabilities can't you, sir?

9 A. Yes.

10 Q. And, Doctor, when we talk about
11 neuromas that's a painful condition also known as
12 a pinched nerve, is that right?

13 A. No, it is not. It is different
14 lesion. Both can cause pain, traumatic neuroma or
15 pinched nerve but they are different lesions.

16 Q. And, Dr. Iakovlev, you're not
17 telling this jury that Ms. Ramirez had any
18 neuromas are you, sir?

19 A. I did not see them in the slides but
20 I cannot rule them out. I see them all the time
21 in mesh specimens. They could have not been just
22 sampled.

23 Q. And, Doctor -- move to strike as
24 nonresponsive.

1 Tissue necrosis that's the same thing as
2 dead tissue isn't it?

3 A. That's correct.

4 Q. And not one of the slides that you
5 showed the jury showed any tissue necrosis did
6 they?

7 A. No, they did not.

8 Q. In fact let's be crystal clear. You
9 saw no dead tissue from Ms. Ramirez in your work
10 in this case, is that correct?

11 A. No, I didn't.

12 Q. Doctor, I'm going to hand you what
13 we'll mark as Exhibit 5 to your deposition.

14 ---DEFENSE EXHIBIT NO. 5: Diagram
15 depicting the female anatomy after a
16 hysterectomy is done.

17 BY MR. HUTCHINSON:

18 Q. We know that Ms. Ramirez had a
19 hysterectomy don't we?

20 A. Yes, we do.

21 Q. And Dr. Iakovlev, would you show
22 that picture to the jury? This diagram shows the
23 female anatomy after a hysterectomy is done, is
24 that correct?

1 A. That's correct.

2 Q. And you can't tell the jury where on
3 that diagram that Ms. Ramirez experienced pain can
4 you?

5 MR. ANDERSON: Objection to form.

6 THE DEPONENT: Well, this diagram
7 describes a hypothetical patient it does not
8 represent Ms. Ramirez. I don't see ovaries here,
9 because she still has ovaries in her body and this
10 diagram doesn't depict them. She has TVT mesh
11 sling and it doesn't depict them so this diagram
12 doesn't represent Ms. Ramirez.

13 BY MR. HUTCHINSON:

14 Q. Move to strike as nonresponsive.

15 Dr. Iakovlev, show the jury that picture
16 and you can't tell the jury where Ms. Ramirez
17 experienced pain in her anatomy can you, sir?

18 MR. ANDERSON: Objection. Asked and
19 answered. Go ahead, answer it again.

20 THE DEPONENT: So my answer is that this
21 diagram does not represent Ms. Ramirez. And I
22 just listed you all the reasons why it does not
23 represent Ms. Ramirez therefore we cannot use this
24 exhibit to demonstrate any anatomical features.

1 BY MR. HUTCHINSON:

2 Q. Dr. Iakovlev, I want to hand you a
3 black marker and why don't you draw the ovaries on
4 that diagram for us please, sir?

5 MR. ANDERSON: Objection.

6 THE DEPONENT: I don't want to use this
7 diagram because it does not represent Ms. Ramirez.

8 BY MR. HUTCHINSON:

9 Q. Are you refusing to draw the ovaries
10 on that diagram?

11 A. Well, it implies that I will try to
12 make it fit Ms. Ramirez's anatomy but I cannot do
13 that.

14 Q. Move to strike as nonresponsive.

15 Are you refusing to draw ovaries on that
16 diagram, Dr. Iakovlev?

17 MR. ANDERSON: Same objection.

18 THE DEPONENT: I will not use a diagram
19 which does to the represent the patient whose
20 specimen I examined.

21 BY MR. HUTCHINSON:

22 Q. Doctor, you can't show the jury on
23 that diagram where Ms. Ramirez experienced pain
24 can you?

1 MR. ANDERSON: Objection, asked and
2 answered. I think we're at three times now. I
3 can probably read it back, but answer it one more
4 time and that's it.

5 THE DEPONENT: This diagram does not
6 represent Ms. Ramirez's anatomy therefore I will
7 not use this diagram for any demonstrations.

8 BY MR. HUTCHINSON:

9 Q. Move to strike as nonresponsive.
10 Doctor, yes or no, can you show the jury
11 on that diagram where Ms. Ramirez experienced
12 pain.

13 MR. ANDERSON: Same objection. And if
14 you keep being rude to him and trying to beat him
15 up we're going to stop it.

16 MR. HUTCHINSON: I'm not being rude.

17 MR. ANDERSON: Yeah, you are. Asking
18 the same question over and over is rude and
19 disrespectful.

20 BY MR. HUTCHINSON:

21 Q. Dr. Iakovlev, you can answer the
22 question.

23 MR. ANDERSON: Asked and answered. Same
24 answer.

1 MR. HUTCHINSON: Your objection is
2 noted, counsel.

3 MR. ANDERSON: I know it is. Go ahead.

4 THE DEPONENT: I cannot demonstrate
5 Ms. Ramirez's anatomy on this diagram because it
6 does not represent Ms. Ramirez.

7 BY MR. HUTCHINSON:

8 Q. Dr. Iakovlev, I want to hand you
9 what we've mark as Exhibit 6 to your deposition.

10 ---DEFENSE EXHIBIT NO. 6: Diagram
11 depicting the muscles in the female
12 pelvic floor.

13 BY MR. HUTCHINSON:

14 Q. This diagram shows the muscles in
15 the female pelvic floor doesn't it, sir?

16 A. That's correct.

17 Q. Would you show it to the jury
18 please? You can't show the jury where Ms. Ramirez
19 experienced pain on this diagram can you?

20 MR. ANDERSON: Objection.

21 THE DEPONENT: The answer would be
22 similar. This diagram actually shows depth of the
23 body around the vagina when the nerves are
24 completely removed. When all the tissue where

1 Ms. Ramirez was experiencing pain, or partially,
2 is removed from this tissue. You can see stumps
3 of the nerves sticking out from behind the bone so
4 it does not represent again the situation
5 Ms. Ramirez was in.

6 BY MR. HUTCHINSON:

7 Q. Move to strike as nonresponsive.

8 Dr. Iakovlev, show the jury that
9 photograph please. And tell the jury where on
10 that photograph that Ms. Ramirez experienced pain?

11 MR. ANDERSON: Objection, asked and
12 answered.

13 THE DEPONENT: So my answer will be that
14 this diagram shows partially dissected human body
15 when the nerves, which are supplying innervation
16 in the area of vagina, are partially removed in
17 the tissue. So that tissue which was experiencing
18 pain, or Ms. Ramirez's tissue, was removed in the
19 graphics. And you can see stumps of the nerves
20 and the vessels sticking from behind the bone. So
21 this does not represent Ms. Ramirez's anatomy
22 either at the time of explantation or now.

23 BY MR. HUTCHINSON:

24 Q. Move to strike as nonresponsive.

1 Dr. Iakovlev, you can't show the jury
2 where Ms. Ramirez experienced pain on that diagram
3 can you?

4 MR. ANDERSON: Objection. Asked and
5 answered. I think --

6 BY MR. HUTCHINSON:

7 Q. I'm asking for a yes or no.

8 MR. ANDERSON: Don't interrupt me
9 please. That's like three times you've asked the
10 same question and you can get the same answer if
11 you want.

12 BY MR. HUTCHINSON:

13 Q. Yes or no, Dr. Iakovlev?

14 A. This diagram does not represent
15 Ms. Ramirez's anatomy.

16 Q. Can you answer that question yes or
17 no?

18 MR. ANDERSON: Objection, asked and
19 answered.

20 THE DEPONENT: I'm giving you the best
21 answer I have.

22 BY MR. HUTCHINSON:

23 Q. Doctor, we know that pain is a
24 subjective complaint don't we?

1 A. To a degree.

2 Q. And in order to find pain the
3 patient has to tell you there's pain doesn't she?

4 A. Yes.

5 Q. And you've never talked with
6 Ms. Ramirez in this case have you, sir?

7 A. That's correct.

8 Q. So, Doctor, I want to talk about
9 foreign body reaction and inflammation as it
10 relates to pain. Okay?

11 A. Okay.

12 Q. Changing gears a bit. It's my
13 understanding you think there is a higher degree
14 of inflammation associated with high rates of
15 pain. Am I right?

16 A. My answer would be that inflammation
17 is one of the factors in the mechanisms of pain.
18 It changes threshold of sensitivity of the
19 tissues. And we all know that inflamed tissue is
20 painful. So that known fact.

21 Q. Doctor, you know that there's some
22 literature that disagrees with you on that don't
23 you?

24 MR. ANDERSON: Objection, form.

1 BY MR. HUTCHINSON:

2 Q. Dr. Iakovlev you know there's some
3 literature --

4 THE VIDEOGRAPHER: Going off the record
5 at 2:09 p.m.

6 --- Break taken.

7 THE VIDEOGRAPHER: We're back on the
8 record at 2:10 p.m.

9 BY MR. HUTCHINSON:

10 Q. Doctor, before we went off the
11 record my question was, you know there's some
12 literature that disagrees with you don't you, sir?

13 A. Specifically what part of my
14 statement would be described in the literature as
15 in opposite -- with opposite conclusions?

16 Q. We're going to talk about your
17 conclusion that inflammation is associated with
18 high rates of pain.

19 MR. ANDERSON: Is that a question.

20 BY MR. HUTCHINSON:

21 Q. I'm going to finish my question. I
22 want to hand you Exhibit 7.

23 ---DEFENSE EXHIBIT NO. 7: Article
24 titled "Histopathology of excised

1 midurethral sling mesh", found in the
2 International Urogynecology Journal,
3 2015.

4 BY MR. HUTCHINSON:

5 Q. This is the Hill paper, is that
6 correct?

7 A. Yes, okay. Sorry. You're correct.

8 Q. And you don't think the Hill paper
9 is funny do you?

10 MR. ANDERSON: Something happened off
11 the record. Don't do that, counsel.

12 MR. HUTCHINSON: I'm sorry, I'll
13 withdraw the question. I thought you were
14 laughing about the Hill paper.

15 MR. ANDERSON: Well I could but I wasn't
16 there.

17 BY MR. HUTCHINSON:

18 Q. Dr. Iakovlev, you have in front high
19 of you the Hill paper entitled "Histopathology of
20 excised midurethral sling mesh". Is that correct?

21 A. That's correct.

22 Q. And you're familiar with this
23 article, aren't you?

24 A. Yes, I am.

1 Q. And it was published by the
2 International Urogynecological Journal, is that
3 right?

4 A. That's correct.

5 Q. And that's the official journal of
6 the International Urogynecological Association, is
7 that right?

8 A. I don't know if it's one -- the
9 official one but it's a journal in
10 urogynecological field of medicine.

11 Q. And you're familiar with that
12 association aren't you, sir.

13 A. Yes, I am.

14 Q. And that's an organization made up
15 of urogynecologists all over the world, isn't it?

16 A. Yes, it is.

17 Q. And the focus of their practice is
18 treating gynecological issues, is that right?

19 A. That's correct.

20 Q. And that's much different than
21 yours. Is that correct, sir? You're not a
22 urologist or a urogynecologist, is that correct?

23 MR. ANDERSON: Objection. That's been
24 asked two or three times. He's a pathologist.

1 He's not a urogynecologist or a gynecologist, so
2 stipulated. Let's not keep asking the same
3 question.

4 MR. HUTCHINSON:

5 Q. Dr. Iakovlev?

6 A. Yeah, the answer is I'm not a
7 urogynecologist I'm a pathologist.

8 Q. And you would consider this a
9 reputable organization wouldn't you?

10 A. Yes, I would.

11 Q. And you read and rely on articles
12 from this same journal don't you?

13 A. Yes.

14 Q. And in fact you consider it
15 authoritative in its field don't you, sir?

16 A. Yes.

17 Q. And the authors of this Hill paper
18 are from the Cleveland Clinic here in the United
19 States. You understand that don't you, sir?

20 A. Yes, they are.

21 Q. And the people who wrote this
22 article were pathologists just like yourself, is
23 that right?

24 MR. ANDERSON: Objection.

1 THE DEPONENT: One of them.

2 BY MR. HUTCHINSON:

3 Q. And that's the one from the
4 Cleveland Clinic. Is that right, sir?

5 A. Well, I think they're all from
6 Cleveland Clinic or from Cleveland. He's from
7 Cleveland Clinic.

8 Q. Thank you. And, Dr. Iakovlev --

9 A. Actually not he, she is from
10 Cleveland Clinic, sorry.

11 Q. Dr. Iakovlev, the conclusion of this
12 Hill study was that mesh taken out for non-pain
13 reasons has more inflammation than mesh taken out
14 because of pain. That's the conclusion of this
15 study. Is that right, sir?

16 MR. ANDERSON: Objection.

17 THE DEPONENT: Well, if you want me to
18 read conclusions I would have to read the
19 conclusions.

20 BY MR. HUTCHINSON:

21 Q. Well, my question to you, sir, in a
22 nutshell, when we talk about the conclusion of the
23 Hill study that's what these authors concluded, is
24 that correct?

1 MR. ANDERSON: Objection to form.

2 THE DEPONENT: So their conclusion was
3 that levels of inflammation -- the way they graded
4 it, because they used their own grading system and
5 they graded only one part of the inflammation, was
6 higher in those meshes which were excised for
7 voiding dysfunction rather than for pain and or
8 exposure. So they would combine meshes which were
9 excised either for pain or for exposure. They did
10 not select specifically a group for pain. It was
11 a combined group.

12 BY MR. HUTCHINSON:

13 Q. Move to strike as nonresponsive.

14 Dr. Iakovlev, the conclusion of the Hill
15 study was that mesh taken out for non-pain reasons
16 has more inflammation than mesh taken out because
17 of pain. That's what the authors found, right?

18 MR. ANDERSON: Objection. Asked and
19 answered and you're putting words in the paper's
20 mouth. Go ahead.

21 BY MR. HUTCHINSON:

22 Q. Yes or no, Dr. Iakovlev.

23 MR. ANDERSON: Same objection.

24

1 BY MR. HUTCHINSON:

2 Q. Can you answer that question yes or
3 no?

4 MR. ANDERSON: Same objection.

5 BY MR. HUTCHINSON:

6 Q. Can you answer that question yes or
7 no?

8 MR. ANDERSON: Same objection.

9 THE DEPONENT: I cannot agree with your
10 wording of the conclusions because the conclusions
11 in the paper are somewhat different.

12 BY MR. HUTCHINSON:

13 Q. Doctor, let's look at the
14 conclusions in the paper. Turn with me to page
15 595. Are you there?

16 A. Well, I'm also looking at
17 conclusions in the abstract because it says --

18 Q. Move to strike as nonresponsive.

19 MR. ANDERSON: You said look at the
20 conclusions. There is no conclusions on the page
21 you are looking at.

22 MR. HUTCHINSON: No, my question was
23 turn to page 595. Are you there?

24 MR. ANDERSON: There is no conclusion

1 there.

2 BY MR. HUTCHINSON:

3 Q. Dr. Iakovlev, are you on page 595?

4 A. Yes, I am.

5 Q. The author write at the bottom:

6 "Vaginally placed, mid-urethral
7 sling mesh that is excised for voiding
8 dysfunction demonstrates elevated
9 levels of inflammation compared to mesh
10 that is excised for pain and/or
11 exposure."

12 Did I read that correctly, sir?

13 A. Yes, you did.

14 Q. And that's the exact opposite of
15 what you found isn't it, sir?

16 MR. ANDERSON: Objection.

17 THE DEPONENT: No, it is not.

18 BY MR. HUTCHINSON:

19 Q. Doctor, do you disagree with the
20 doctors from the Cleveland Clinic?

21 MR. ANDERSON: Objection, form.

22 THE DEPONENT: You mean with their
23 conclusions? With their results.

24

1 BY MR. HUTCHINSON:

2 Q. Yes, sir, you disagree with the
3 Cleveland Clinic doctors' conclusions don't you,
4 sir?

5 A. Well, I mean, the way they did the
6 study that's what numbers they got. But if you
7 want me to discuss exactly how it was done and how
8 they reached to those conclusions I can go ahead
9 and discuss it.

10 Q. Move to strike as nonresponsive.

11 Doctor, my question is do you disagree
12 with the conclusions that the Cleveland Clinic
13 doctors found in the Hill paper? Yes or no?

14 MR. ANDERSON: Objection, asked and
15 answered.

16 BY MR. HUTCHINSON:

17 Q. I'm asking for a yes or no answer.
18 Can you answer that question yes or no,
19 Dr. Iakovlev?

20 MR. ANDERSON: Same objection.

21 BY MR. HUTCHINSON:

22 Q. Not without looking to at your
23 transcript. I'm going to object to the extent the
24 witness is reviewing an iPad that has in

1 real-time his transcript.

2 MR. ANDERSON: You can ask every time
3 that you would like to know -- you can ask the
4 court reporter to repeat it and then she can
5 repeat his question for you if you want, or you
6 can ask him to repeat it. And when the time is up
7 today the time will be up. So if you want to chew
8 up your time go right ahead, pal. So go ahead.
9 If you need to ask her to re-read something as
10 many times as you want then you feel free to do
11 it. Alright? Good.

12 THE DEPONENT: Okay.

13 BY MR. HUTCHINSON:

14 Q. Dr. Iakovlev, can you answer that
15 question yes or no?

16 A. You have to repeat the question now.

17 Q. Do you agree with the conclusions
18 that the authors from the Cleveland Clinic found
19 in the Hill paper?

20 MR. ANDERSON: Same objection. Go
21 ahead.

22 BY MR. HUTCHINSON:

23 Q. Yes or no?

24 MR. ANDERSON: Objection to form as

1 well.

2 BY MR. HUTCHINSON:

3 Q. My question is asking for a yes or
4 no, Dr. Iakovlev, and then I'll give you an
5 opportunity to give a brief explanation. But my
6 question is asking for a yes or no. Do you --

7 A. I would have no specific opinion
8 regarding their conclusions. That's what their
9 conclusions in the study. I wasn't doing the
10 study. I can explain you what they did, how they
11 came to these conclusions but the conclusions are
12 there. I mean, I don't agree or disagree. I
13 didn't do the study.

14 Q. Can you answer that question yes or
15 no?

16 A. I cannot answer it yes or no because
17 I did not do the study.

18 Q. Doctor, let's switch gears for a
19 minute and I want to talk about Prolene. Okay?

20 A. Yes.

21 Q. Now, you were asked by the
22 plaintiff's lawyer to look at Ms. Ramirez's
23 explanted mesh, is that right?

24 A. That's correct.

1 Q. And her mesh is made of a material
2 known as Prolene?

3 A. That's a brand name. Ethicon's
4 brand name of polypropylene.

5 Q. And you know that Ethicon's Prolene
6 material has been used in the body for almost 50
7 years?

8 A. That's correct.

9 Q. And St. Michael's, that's the
10 hospital where you work in Canada, is that
11 correct?

12 A. That's correct.

13 Q. And St. Michael's uses Prolene
14 sutures don't they, sir?

15 A. Yes, they do.

16 Q. And the hospital where you work in
17 Canada uses Prolene mesh for hernia repair. Isn't
18 that correct, sir?

19 A. Yes, they do.

20 Q. And, Dr. Iakovlev, you have never
21 told anybody at the hospital where you work to
22 stop using Prolene sutures have you?

23 MR. ANDERSON: Objection. Go ahead.

24 THE DEPONENT: Not sutures.

1 BY MR. HUTCHINSON:

2 Q. Doctor, let's talk about
3 Ms. Ramirez's explant.

4 A. Okay.

5 Q. It was taken out in September of
6 2010, and I'll represent to you that was the date.
7 Does that sound about right?

8 A. No, it was taken in March 2015.

9 Q. I'm sorry, strike that. It was
10 implanted -- strike that.

11 Ms. Ramirez's TVT-O was implanted in
12 September of 2010?

13 A. That's correct.

14 Q. And part of it was taken out in
15 March of 2015?

16 A. That's correct.

17 Q. And the mesh that you examined was
18 in her body for four and a half, five years, is
19 that correct?

20 A. Yes.

21 Q. And at some point after it was
22 removed the mesh samples were divided between the
23 plaintiffs and defendants, is that correct?

24 A. We divided it with the defendant's

1 consultant.

2 Q. And you received half and the
3 defendants received half, is that right?

4 A. That's correct.

5 Q. So after it was removed from her
6 body it was placed in formalin?

7 A. That's correct.

8 Q. And that's how you received it?

9 A. That's correct.

10 Q. And you didn't alter the specimen
11 did you, sir?

12 A. What do you mean?

13 Q. Did you alter the specimen? Did you
14 try and take any proteins of the specimen?

15 MR. ANDERSON: Different question.
16 Object to form anyway.

17 THE DEPONENT: I don't exactly
18 understand what you're asking.

19 BY MR. HUTCHINSON:

20 Q. Well let's be precise, Dr. Iakovlev.
21 You received the excised mesh with tissue on it in
22 a jar of formalin, is that correct?

23 A. That's correct.

24 Q. And you never saw the mesh before it

1 was placed in this formalin, is that right?

2 A. That's correct.

3 Q. Now, we've used the word "formalin"
4 a lot but I want us to understand that's a
5 solution that contains chemicals such as
6 formaldehyde, isn't that right?

7 A. That's right. I explained it
8 earlier what it is and how we use it.

9 Q. And formaldehyde that's a chemical
10 that's used to embalm people who've died, is that
11 right?

12 A. Part of it. I mean, embalming fluid
13 is a complex fluid. There are many other
14 substances in it.

15 Q. But the bottom line is formalin
16 preserves the tissue so it won't rot or decay?

17 A. That's correct. It's been used like
18 this for pathology for hundred years.

19 Q. And this preservation allows a
20 pathologist like yourself to study tissue?

21 A. That's correct.

22 Q. And you'll agree that after tissue
23 has been in formalin it will contract?

24 A. To a degree.

1 Q. Thank you. Now let's talk about
2 tissue, Dr. Iakovlev. You know that human tissue
3 contains proteins?

4 A. Yes.

5 Q. In fact human tissue is mostly
6 proteins isn't it, sir?

7 A. Human tissue is mostly water and
8 then what is not water is mostly proteins.

9 Q. Proteins is a close second, will you
10 give me that?

11 A. Yes.

12 Q. And proteins adsorb to the mesh
13 explants don't they, sir?

14 MR. ANDERSON: Objection to form.

15 BY MR. HUTCHINSON:

16 Q. They stick to it?

17 A. I'm not sure if we can call it like
18 this. Proteins surround the --

19 Q. The explant.

20 MR. ANDERSON: Let him finish his
21 answer.

22 THE DEPONENT: The implant. Anything
23 goes in the body the fluid with proteins fills all
24 the spaces and surrounds all the parts. If it

1 sticks or doesn't stick that's a different
2 question but it surrounds.

3 BY MR. HUTCHINSON:

4 Q. And human protein coat a medical
5 device once it's put in the body. Is that
6 correct, sir?

7 A. Again, I wouldn't call it "coating"
8 or "not coating" they surround it. If they coat
9 or not that's -- that depends on the materials.

10

11 THE COURT REPORTER: Counsel in the call
12 has been disconnected. Just to let you know.

13 THE VIDEOGRAPHER: Going off the record
14 at 2:24 p.m.

15 --- Break taken.

16 THE VIDEOGRAPHER: Back on the record at
17 2:27 p.m.

18 BY MR. HUTCHINSON:

19 Q. Dr. Iakovlev, you'll agree that
20 foreign objects such as a mesh implant become
21 coated with human proteins?

22 A. As I said, coating, not coating,
23 permanent coating, I mean, it depends on the
24 material, it depends on the timing. At one point

1 they can be and then that coating is being
2 resorbed.

3 Q. Move to strike as nonresponsive.

4 Dr. Iakovlev, my question is for a yes
5 or no, do you agree that foreign objects become
6 coated with human proteins?

7 MR. ANDERSON: Same objection. And --
8 well object to form, and asked and answered, and
9 you can give him the same answer.

10 THE DEPONENT: Foreign objects are
11 surrounded. Some of them can be coated, depends
12 on the object, depends on the surface properties.

13 BY MR. HUTCHINSON:

14 Q. Well in fact, Doctor, you've written
15 "Foreign objects become coated with human proteins
16 before the appearance of the inflammatory cells."
17 That's something you've written.

18 A. Yes, I did. And I'm saying that
19 some of them become firmly coated, some of them
20 just surround it. It all depends on an object.

21 Q. And, Dr. Iakovlev, you've made no
22 efforts to clean off the proteins from
23 Ms. Ramirez's explant, is that correct?

24 MR. ANDERSON: Objection to form.

1 THE DEPONENT: That would destroy my
2 histology completely. That's not what
3 pathologists do. Pathologists try to preserve the
4 specimen the way it is and then examine it in
5 cross-sections. I mean, why would I do that?

6 BY MR. HUTCHINSON:

7 Q. Move to strike as nonresponsive.

8 My question, Doctor, you didn't make any
9 efforts to clean the formalin -- strike that.

10 My question, Doctor, you didn't make any
11 efforts to clean off the proteins from the explant
12 from Ms. Ramirez, correct?

13 MR. ANDERSON: Objection, asked and
14 answered. Go ahead.

15 THE DEPONENT: I mean, in opposite. I
16 try to preserve as much as possible of the
17 specimen.

18 BY MR. HUTCHINSON:

19 Q. Now, we know that the mesh was put
20 in formalin?

21 A. That's correct, for preservation.

22 Q. For preservation. And we know the
23 mesh was coated with proteins, correct?

24 A. At the time of explantation or at

1 any time?

2 Q. At the time it was taken out of her
3 body.

4 A. Whatever was outside of the mesh was
5 containing proteins. I mean, that's the nature of
6 human tissues. If it surrounds foreign body there
7 are proteins.

8 Q. Thank you. And, Doctor, you
9 understand that formalin crosslinks with proteins
10 that are in the tissue. That's something you
11 understand, is that right?

12 A. That's how it preserves it.

13 Q. And that's pathology 101 isn't it?

14 A. 101 I don't know but how it
15 preserves proteins.

16 Q. That's part of the basic
17 pathological training that you've participated in.
18 Is that right, sir?

19 A. Yes.

20 Q. And you'll agree that the formalin
21 and protein crosslinking will stiffen the tissue?

22 A. Yes, it is. It does.

23 Q. And it stiffens the tissue so that a
24 pathologist like yourself can make slices of the

1 bread that you discussed this morning in your
2 direct exam, correct?

3 A. No, that's not correct. That's not
4 why we do it. If you want me to give full answer
5 or yes or no answer, I mean, but your statement
6 was not correct.

7 Q. Doctor, you don't know the specific
8 details of the chemical reaction that occurs when
9 formalin crosslinks with tissue, you?

10 A. Well you just said it, it
11 crosslinks.

12 Q. My question, Doctor, is you don't
13 know the specific details of the chemical reaction
14 that occurs when formalin crosslinks with tissues,
15 yes or no?

16 A. You just named it. Molecules of
17 formalin crosslink with proteins. That's what the
18 chemical process is.

19 Q. That's something that you know?

20 A. Yes.

21 Q. Okay. Doctor, I want to hand you
22 the trial transcript in the Bellew case. Now you
23 testified under oath in front of a judge and a
24 jury in the Bellew case in West Virginia didn't

1 you, sir?

2 A. Yes.

3 Q. And did you promise to tell the
4 truth when you took the witness stand?

5 MR. ANDERSON: He testified under oath.
6 Why do you keep trying to beat him up like that?

7 BY MR. HUTCHINSON:

8 Q. Dr. Iakovlev --

9 MR. ANDERSON: He testified under oath.
10 So stipulated.

11 BY MR. HUTCHINSON:

12 Q. Dr. Iakovlev, did you promise to
13 tell the truth when you were in West Virginia
14 talking to the judge and jury?

15 MR. ANDERSON: Same objection.

16 BY MR. HUTCHINSON:

17 Q. Dr. Iakovlev, did you promise to
18 tell the truth when you were talking to the judge
19 and jury in West Virginia?

20 MR. ANDERSON: Same objection.

21 BY MR. HUTCHINSON:

22 Q. I need an answer. Yes or no?

23 A. I've answered the question many
24 times.

1 Q. My question is, Doctor, did you
2 promise to tell the truth when you were talking to
3 the judge and jury in West Virginia?

4 MR. ANDERSON: Same objection.

5 BY MR. HUTCHINSON:

6 Q. Yes or no.

7 MR. ANDERSON: Same objection.

8 THE DEPONENT: Yes, I did.

9 BY MR. HUTCHINSON:

10 Q. Doctor, let's look at page 676, line
11 24. Question, are you there with me?
12 Dr. Iakovlev?

13 A. Just let me read the whole page.

14 Q. I'm on page 676, line 24. Are you
15 there with me now, Dr. Iakovlev?

16 A. Yes, I am.

17 Q. "QUESTION: Can you tell the jury
18 the chemical reaction that occurs when
19 formalin crosslinks with the tissues.

20 "ANSWER: Specific details?

21 "QUESTION: Yes.

22 "ANSWER: I don't know specific
23 details. It crosslinks, binds proteins
24 together so they cannot be degraded by

1 bacteria."

2 Did I read that correctly, sir?

3 MR. ANDERSON: Exactly. Objection to
4 improper impeachment. That's exactly what he
5 said. Did he read it right?

6 THE DEPONENT: Yes, he read it right.

7 BY MR. HUTCHINSON:

8 Q. And, Doctor, specifically for
9 Prolene you don't know the extent to which protein
10 forms a bond with Prolene do you?

11 A. Um, can you repeat that question?

12 Q. You don't know the extent to which
13 proteins form a bond with Prolene do you?

14 A. Which protein? You have to -- I
15 mean, there are hundreds of proteins in the human
16 body. Some of them don't bind to anything and
17 some of them bind -- I mean their function is to
18 bind to surfaces. So which exactly protein are
19 you asking?

20 Q. Doctor, I'm talking about any of the
21 proteins that you've ever studied as a
22 pathologist. You don't know the extent to which
23 proteins form a bond with Prolene do you, sir?

24 A. Like chemical bond?

1 MR. ANDERSON: He asked you a question.

2 THE DEPONENT: Are you asking about
3 chemical bond?

4 BY MR. HUTCHINSON:

5 Q. Yes, sir.

6 A. Hydrostatic bond, electrostatic
7 bond.

8 Q. Chemical bond.

9 A. I don't think there is any chemical
10 bond between proteins and Prolene.

11 Q. And, Doctor, you don't know the
12 extent to which proteins form a bond with Prolene
13 from an adhesion standpoint do you, sir?

14 A. What do you mean again adhesion? Is
15 it covalent bond? Is it electrostatic,
16 hydrostatic bond? I mean, you have to ask
17 specific question.

18 Q. Can you answer the question as I've
19 asked it?

20 A. Not the way you asked.

21 Q. And, Doctor, let's talk about how
22 you prepared the samples from Ms. Ramirez. Okay?

23 A. Sure.

24 Q. I want to talk about how you made

1 the slices of the bread, so to speak. Alright?

2 A. If you want to use that analogy,
3 yes, we can.

4 Q. And the Ramirez slides were
5 processed the same way that you've processed
6 slides for other litigation, is that correct?

7 A. For all specimens processed in the
8 lab, all labs in North America use exactly the
9 same process.

10 Q. Okay.

11 A. And we use the same machinery. We
12 use the same chemicals. Everything is processed
13 the same way.

14 Q. Let's talk about how it was done
15 here in Canada, okay?

16 A. It's not just in Canada. It's done
17 the same way anywhere in the world.

18 Q. I understand. It was done pursuant
19 to the St. Michael's protocol, is that right?

20 A. I'm telling you this is not our
21 protocol. It's a machine which is made maybe in
22 United States, maybe in Europe and chemicals are
23 likely made in the United States. They are bought
24 in large supplying companies. Everything is

1 shared.

2 Q. Move to strike as nonresponsive.

3 MR. ANDERSON: You said let's talk about
4 how it's not in Canada and he's answering your
5 question.

6 BY MR. HUTCHINSON:

7 Q. My question is very specific. It
8 was done pursuant to the St. Michael's protocol,
9 correct?

10 MR. ANDERSON: Objection to the form.

11 THE DEPONENT: Our protocols don't
12 differ from any other protocol. Again, I don't
13 think we can modify much machinery.

14 BY MR. HUTCHINSON:

15 Q. Move to strike as nonresponsive.

16 Dr. Iakovlev, Ms. Ramirez's slides were
17 processed pursuant to the St. Michael's protocol,
18 correct?

19 A. We do exactly the same way as any
20 other lab in North America. I mean, our protocols
21 are exactly the same as in any other lab.

22 Q. Move to strike as nonresponsive.

23 Dr. Iakovlev, Ms. Ramirez's slides were
24 processed pursuant to the St. Michael's protocol,

1 correct? It's a yes or no.

2 MR. ANDERSON: Do you understand the
3 question.

4 THE DEPONENT: I do.

5 MR. ANDERSON: Okay. Objection to form.
6 Go ahead.

7 BY MR. HUTCHINSON:

8 Q. I'm asking for a yes or no,
9 Dr. Iakovlev.

10 A. Yes, they were done exactly the same
11 way as all other diagnostic specimens.

12 Q. Thank you. Now, as part of the St.
13 Michael's protocol the sample was first exposed to
14 alcohol or ethanol, correct?

15 A. No. The samples came in formalin so
16 first stage is formalin.

17 Q. And then after formalin, according
18 to the St. Michael's protocol, the samples are
19 exposed to ethanol or a form of alcohol, correct?

20 A. According to all protocols in North
21 American laboratories after formalin there are
22 several solutions of alcohol.

23 Q. Is that a yes, Dr. Iakovlev?

24 A. Yes to what?

1 Q. My question of whether or not the
2 sample was exposed to alcohol?

3 A. They were exposed to alcohol --

4 Q. Thank you.

5 A. -- like in any other lab.

6 Q. Thank you. And alcohol causes
7 tissue to shrink doesn't it, sir?

8 MR. ANDERSON: Objection to form.

9 THE DEPONENT: To a degree.

10 BY MR. HUTCHINSON:

11 Q. Thank you. And as part of the St.
12 Michael's protocol the sample of Ms. Ramirez was
13 treated with a chemical known as xylene. Is that
14 correct, sir?

15 A. In all labs the next step after
16 alcohol will be xylene.

17 Q. And xylene is a solvent isn't it,
18 sir?

19 A. It is.

20 Q. Xylene is used to dissolve the
21 paraffin wax used in the embedding process. Isn't
22 that correct, sir?

23 A. That's correct.

24 Q. And xylene is a chemical that's not

1 found naturally in the body is it?

2 A. No.

3 Q. And in fact you've never analyzed
4 the chemical effect that xylene has on Prolene
5 have you, sir?

6 A. I have. I did.

7 Q. Doctor, let's look at the Bellew
8 transcript. You have it in front of you.

9 A. Yes, I do.

10 Q. This is when you testified in front
11 of the judge and the jury in West Virginia, is
12 that correct?

13 A. Yes.

14 Q. And if you turn with me to page 679.

15 A. Yes.

16 Q. Line 15.

17 A. Yes.

18 Q. You say -- or, I'm sorry:

19 "QUESTION: You've never analyzed the
20 extent that xylene can act as a solvent
21 on polypropylene, correct?

22 "ANSWER: I did.

23 "QUESTION: You -- you --

24 "ANSWER: I did place new mesh in

1 xylene. It's been sitting for eight
2 months. The mesh didn't change.

3 "QUESTION: Have you analyzed that mesh
4 chemically?

5 "ANSWER: No, not chemically."

6 Correct?

7 A. That's correct.

8 Q. So let's be clear, you have never
9 analyzed the chemical effect that xylene has on
10 Prolene have you, sir?

11 A. There is a big difference chemical
12 effect versus chemical testing. Because chemical
13 effect is changing of chemical structure it can
14 manifest itself in different shapes and forms.
15 Chemical testing is a specific type of testing and
16 it may or may not be specifically related to
17 chemical changes.

18 Q. Dr. Iakovlev --

19 MR. ANDERSON: No, no, hold on. He's
20 not --

21 MR. HUTCHINSON: Yeah, he is finished.

22 MR. ANDERSON: No, his hands are in the
23 air and he's not through talking.

24 THE DEPONENT: So the word "chemical"

1 for these two concepts is used in completely
2 different terms. One is chemical testing the
3 other one is chemical changes.

4 BY MR. HUTCHINSON:

5 Q. Dr. Iakovlev, you've never done any
6 chemical testing on the effect that xylene has on
7 Prolene have you, sir?

8 A. Um, well I used chemicals to stain
9 the mesh which had been exposed to xylene, that's
10 a part of chemicals. If we talk about some
11 chemical reactions, some material scientists type
12 of protocols I did not use those.

13 Q. Thank you.

14 Doctor, I want to hand you what we'll
15 mark as Exhibit 8 to your deposition.

16 ---DEFENSE EXHIBIT NO. 8: Document
17 titled "TR-19/2007 Chemical Resistance
18 of Thermoplastics Piping Materials"
19 from the Plastics-Pipe Institute, dated
20 September 2007.

21 BY MR. HUTCHINSON:

22 Q. This is a Chemical Resistance of
23 Thermoplastics Piping Materials document. Do you
24 see that?

1 A. Doesn't specifically say medical
2 devices -- Chemical Resistance of Thermoplastics
3 Piping Materials.

4 Q. And, Doctor, you've seen this
5 document before haven't you? You cite it in your
6 reports, your Wave 1 reports don't you, sir?

7 A. I reviewed a number of testing --
8 tables and testing. Could be one of them.

9 Q. Thank you. And, Doctor, let's go to
10 the tables, the very last page. Are you there
11 with me?

12 A. No, just give me one second.

13 Q. The last page.

14 A. No, just give me one second.

15 Q. Oh, I'm sorry.

16 A. So which page number?

17 Q. The last page, Doctor, of the
18 document that you have.

19 A. Yes.

20 Q. And at the top in the top left it
21 says "xylene", under chemical. Is that right?

22 A. Yes.

23 Q. And along the top line it says,
24 "PP". Now that stands for polypropylene, is that

1 correct?

2 A. Most likely, yes.

3 Q. And under PP we have an "N", is that
4 correct?

5 A. Yes.

6 Q. And, Doctor, you know that "N"
7 stands for plastic type is not resistant? You
8 know that, Doctor, don't you?

9 A. It's used in different tables
10 differently.

11 Q. Well, if you turn to page --

12 MR. ANDERSON: Hold on, let him finish.

13 THE DEPONENT: I would have to see
14 exactly what it means, what temperatures.

15 BY MR. HUTCHINSON:

16 Q. Doctor, let's look at page 7. My
17 question is are you on page 7?

18 A. Yes, I am on page 7. So I'm trying
19 to read what "N" means.

20 Q. And "N" on page 7 means plastic type
21 is not resistant, correct?

22 A. Not resistant, swelling over 8
23 percent, weight loss over 5 percent and elongation
24 of break decreased by 50 percent.

1 Q. And, Doctor, on that same page "PP"
2 means polypropylene, correct?

3 A. That's correct.

4 Q. And if we look on the very last
5 page, polypropylene has an "N" by it doesn't it?

6 A. Plastics at maximum operating
7 temperature.

8 Q. No, sir, my question is -- show the
9 jury the last page.

10 A. Wait a second, I need to see all the
11 data in the table before I answer this question.

12 Q. Well, my question is polypropylene
13 has the letter "N" by it doesn't it, sir?

14 A. These tables are designed for
15 maximum --

16 Q. Move to strike as nonresponsive.

17 Dr. Iakovlev, focus on my question.

18 MR. ANDERSON: Well, don't tell him what
19 to do.

20 THE DEPONENT: I cannot interpret the
21 table unless I read everything which is in this
22 table and I have to know exactly what it means.

23 BY MR. HUTCHINSON:

24 Q. My question, sir, is yes or no, by

1 xylene in a document that you cite in some of your
2 reports, it has the letter "N" by polypropylene,
3 correct? Can you answer that question, yes or no?

4 A. I have to read and what it says and
5 what it means plastics and maximum operating
6 temperature before I answer that question.

7 Because the whole table is designed for maximum
8 operating temperature.

9 Q. Doctor, my question is on the last
10 page of this document polypropylene has the letter
11 "N" by it doesn't it, sir?

12 A. So the whole table is subject to
13 knowing what is maximum operating temperature. I
14 don't know what maximum operating temperature here
15 is therefore that "N" applies to specific
16 condition of maximum operating temperature.

17 Q. Move to strike as nonresponsive.

18 Dr. Iakovlev, would you show the jury
19 the chart on the last page? And hold on just a
20 minute, I'm going to ask the videographer to zoom
21 in on the word "PP" at the top and the letter "N"
22 under the word "PP".

23 Now my question to you, Dr. Iakovlev, is
24 does the word PP or polypropylene have the letter

1 "N" by it, yes or no.

2 MR. ANDERSON: Keep your voice down,
3 counsel.

4 THE DEPONENT: So the whole table --

5 BY MR. HUTCHINSON:

6 Q. Move to strike as nonresponsive. I
7 need a yes or no.

8 MR. ANDERSON: He didn't even answer
9 before you moved to strike as nonresponsive at the
10 end of your own question. What do you want him to
11 answer?

12 BY MR. HUTCHINSON:

13 Q. Yes or no? Can you answer the
14 question yes or no, Dr. Iakovlev?

15 A. I cannot answer you yes or no. I
16 can only answer you with full answer.

17 Q. Dr. Iakovlev, PP has the letter "N"
18 by it, yes or no?

19 A. Yes.

20 Q. And, Dr. Iakovlev, "N" stands for
21 plastic type is not resistant, is that correct?

22 A. Not resistant at maximum operating
23 temperature.

24 Q. And, Dr. Iakovlev, this document

1 shows that xylene, the chemical that was used with
2 Ms. Ramirez's explanted mesh is not resistant to
3 xylene doesn't it, sir?

4 A. I do not know what maximum operating
5 temperature was used for this table, therefore we
6 cannot compare two conditions which may be
7 completely different. Something may be so hot
8 that it starts dissolving.

9 Q. You can't answer the question can
10 you?

11 A. I cannot answer because I don't have
12 all information.

13 MR. ANDERSON: Objection asked and
14 answered.

15 BY MR. HUTCHINSON:

16 Q. And, Dr. Iakovlev, did you ever
17 study the effect that xylene had on Ms. Ramirez's
18 explanted mesh?

19 A. Well, I saw the specimen which was
20 exposed to xylene. I did not see it dissolving.
21 Polypropylene was still there, it did not
22 dissolve.

23 Q. Dr. Iakovlev, the sample was also
24 treated with permount wasn't it?

1 A. Yes.

2 Q. And permount has toluene in it
3 doesn't it, sir?

4 A. Yes, it's a similar solvent.

5 Q. And you've never analyzed the
6 chemical effect that toluene has on Prolene have
7 you, sir?

8 A. Well, you saw it in the pictures.
9 The polypropylene was still there, it did not
10 dissolve so that is my analysis.

11 Q. Move to strike as nonresponsive.

12 A. I answered you. I did study the
13 slides in permount. These slides they still have
14 permount and I showed it in microscope.
15 Polypropylene is still there, it did not dissolve.

16 Q. Dr. Iakovlev, turn with me to page
17 683.

18 A. Of?

19 Q. Of your transcript for the Bellew
20 case. Again that's the same case where you
21 testified in front of the judge and jury in West
22 Virginia, is that correct?

23 A. Yes, it is correct. Which page
24 number?

1 Q. Page 683, line 2. Are you there?

2 MR. ANDERSON: Objection, inappropriate
3 impeachment. It's the exact same question you
4 gave and the exact same answer he gave.

5 BY MR. HUTCHINSON:

6 Q. Dr. Iakovlev, are you there with me?

7 A. Yes, I am.

8 MR. FREESE: Same objection.

9 BY MR. HUTCHINSON:

10 Q. "QUESTION: And toluene is -- does
11 Not behave well with polypropylene. Do
12 you know that?

13 "ANSWER: I don't know. As I said, I
14 put one mesh in xylene and it stays
15 intact for several months.

16 "QUESTION: But you have not analyzed
17 that chemically have you?

18 "ANSWER: No, I didn't."

19 Did I read that correctly?

20 MR. ANDERSON: Different question and
21 answer than counsel posed before. It's an
22 inappropriate way to impeach someone with their
23 testimony, reading different questions and
24 different answers. Go ahead.

1 THE DEPONENT: There is toluene and then
2 xylene. I'm not sure exactly what we were talking
3 about.

4 BY MR. HUTCHINSON:

5 Q. Did I read that correctly, sir?

6 A. Oh, you read it correctly.

7 Q. Thank you. And, Doctor, when we
8 talk about these slides from Ms. Ramirez, they
9 were prepared here in your lab, is that right?

10 A. That's correct.

11 Q. At St. Michael's in Canada, is that
12 correct?

13 A. Yes.

14 Q. And by technicians who work for you,
15 is that right?

16 A. Not for me for the hospital, for the
17 lab.

18 Q. And, Doctor, you can't tell us the
19 names of any specific technicians who prepared
20 those slides for Ms. Ramirez can you?

21 MR. ANDERSON: Objection.

22 THE DEPONENT: Well, I mean, I know
23 their names. I don't exactly who was working on
24 that day.

1 BY MR. HUTCHINSON:

2 Q. Be you can't tell us the specific
3 technicians who prepared the slides for
4 Ms. Ramirez can you, sir?

5 A. No, there were several.

6 Q. Doctor, if you will turn with me to
7 the exhibit that was used with you this morning,
8 Exhibit 7(C). And I'm going to ask the IT folks
9 to put it up on to the screen please.

10 A. So which?

11 Q. Exhibit 7(C).

12 A. I don't have the numbers so you have
13 to show it to me.

14 Q. Do you have that in front of you,
15 Doctor?

16 A. Yes, I'm just checking where --

17 Q. And, Dr. Iakovlev I believe you told
18 us this morning that you use this photograph to
19 illustrate some degradation, alleged degradation
20 of Ms. Ramirez's mesh, is that correct?

21 A. That's correct.

22 Q. And the pathologists at UT
23 Southwestern, that's where Ms. Ramirez went isn't
24 it? Strike that.

1 The pathologists where Ms. Ramirez went
2 to the hospital they didn't do these same type of
3 tests that you did did they?

4 A. No, they didn't examine for
5 degradation at all.

6 Q. In fact not one of the doctors in
7 Texas who looked at Ms. Ramirez examined the mesh
8 for degradation did they?

9 A. Well, I mean the only person who
10 could it was a pathologist.

11 Q. And, Dr. Iakovlev, that's the same
12 pathologist who found no degradation in his final
13 pathology report, correct?

14 MR. ANDERSON: Objection.

15 THE DEPONENT: That's not correct. Who
16 did not look for degradation either it's there or
17 not.

18 BY MR. HUTCHINSON:

19 Q. And, Doctor, let's be clear, but we
20 look at this exhibit that's shown the jury now,
21 not one of the doctors in Texas did this type of
22 work did they?

23 MR. ANDERSON: Same -- asked and
24 answered. Go ahead.

1 THE DEPONENT: The only person who could
2 was the pathologist. He did not examine
3 polypropylene for degradation.

4 BY MR. HUTCHINSON:

5 Q. Thank you. And, Doctor, would you
6 look at us, please?

7 A. Yes.

8 Q. You can't tell the jury what
9 triggers the degradation process to occur can you?
10 Dr. Iakovlev?

11 A. Give me one second. I'm thinking
12 how to answer.

13 Q. I'm asking for a yes or no.

14 MR. ANDERSON: Hey, he's trying to
15 answer your question. Quit stop jumping in.
16 That's rude.

17 BY MR. HUTCHINSON:

18 Q. I'll withdraw the question.

19 MR. ANDERSON: Alright.

20 BY MR. HUTCHINSON:

21 Q. Dr. Iakovlev, yes or no, you can't
22 tell us what triggers the degradation process to
23 occur can you?

24 A. It sounds like you're chasing me.

1 Q. Move to strike as non-responsive.

2 A. So my answer will be that body
3 reaction against polypropylene triggers
4 degradation.

5 Q. Doctor, you can tell us what
6 triggers the degradation process to occur? Is
7 that what you're telling us?

8 MR. ANDERSON: Objection, different
9 question. Go ahead.

10 THE DEPONENT: I don't understand the
11 question. What specific chemicals? What in
12 general process triggers degradation? In general
13 the process is triggered by the body reaction
14 against polypropylene. Specific chemical
15 reactions would be area of expertise of material
16 scientists.

17 BY MR. HUTCHINSON:

18 Q. And, Doctor, you can't tell us what
19 triggers the degradation process to occur can you?
20 Yes or no?

21 MR. ANDERSON: Wait, how many times are
22 you going to ask him the same question?

23 MR. HUTCHINSON: I haven't gotten an
24 answer yet.

1 MR. ANDERSON: Yeah, you did. He said,
2 I don't understand the question. What specific
3 chemicals? In general the process is triggered by
4 the body -- body's reaction against polypropylene.
5 Specific chemical reactions would be an area for
6 the material scientists. That is your answer.

7 BY MR. HUTCHINSON:

8 Q. Dr. Iakovlev, my question is asking
9 for a yes or no. You can't tell us what triggers
10 the degradation process to occur. Yes or no?

11 MR. ANDERSON: Objection, asked and
12 answered. You can't make him say yes or no.

13 THE DEPONENT: I cannot answer yes or no
14 when the question is so broad. I have to specify
15 at least to a degree.

16 BY MR. HUTCHINSON:

17 Q. Dr. Iakovlev, I want to hand you
18 your testimony in the Serrano case versus American
19 Medical Systems. Do you have that in front of
20 you?

21 A. Yes, I do.

22 Q. And, Dr. Iakovlev, if you'll turn
23 with me please to page 310.

24 A. So this is different manufacturer,

1 this a different product.

2 Q. Move to strike as nonresponsive.

3 My question was can you turn with us to
4 page 310?

5 A. And it's March 6, 2014.

6 Q. Move to strike as nonresponsive.

7 Dr. Iakovlev --

8 MR. ANDERSON: Hey, he's turning into
9 the deposition to find the page that you're asking
10 him to. Can you quit hammering him with questions
11 while he can look.

12 MR. HUTCHINSON: He's there.

13 MR. ANDERSON: Yes or no, can you answer
14 the question?

15 THE DEPONENT: Which page number.

16 BY MR. HUTCHINSON:

17 Q. Page 310.

18 MR. ANDERSON: I guess he's not, huh?

19 BY MR. HUTCHINSON:

20 Q. Page 310. Are you on page 310?

21 Page 310, line 3. Are you there with me,

22 Dr. Iakovlev?

23 MR. ANDERSON: Again, objection. It's
24 the exact same answer he gave. It's an

1 inappropriate method to try to impeach a witness
2 when they give you the exact same answer. Go
3 ahead, Doctor.

4 BY MR. HUTCHINSON:

5 Q. Dr. Iakovlev --

6 A. Just give me a second. I need to
7 read. You're chasing me again. Okay.

8 Q. Are you with me on page 310, line 3,
9 of your Serrano deposition?

10 A. That's correct.

11 Q. "QUESTION: What is the trigger for
12 That degradation process?

13 "ANSWER: It's very complex. I don't
14 think it's been studied. I could not
15 tell you. I mean, the working now
16 evidence is oxidated environment, but
17 I'm not the expert in that specific
18 biochemistry. I cannot testify to
19 that."

20 MR. ANDERSON: Exactly same. Objection.

21 BY MR. HUTCHINSON:

22 Q. Did I read that correctly,
23 Dr. Iakovlev?

24 A. Yes, you did.

1 Q. And, Doctor, you can't tell us the
2 rate at which degradation occurs, can you?

3 A. How would we measure rate?

4 MR. ANDERSON: Object to form. Go
5 ahead.

6 THE DEPONENT: You mean thickening of
7 the bark over period of time? Change of molecular
8 weight or tensile -- I mean, exactly how do we
9 measure the objective parameter for that question?

10 BY MR. HUTCHINSON:

11 Q. Move to strike as nonresponsive?

12 A. But you ask a question which is
13 impossible to answer.

14 Q. Doctor, turn with me please to page
15 311, line 4 of your pre-trial deposition. Are you
16 there?

17 A. Which one?

18 Q. Serrano, same case.

19 A. But that's 2014, way before I did my
20 degradation study.

21 Q. Move to strike as nonresponsive.

22 A. Okay.

23 Q. Doctor, turn with me please to page
24 311, line 4. Are you there?

1 A. Yes.

2 Q. "QUESTION: So you can't tell me
3 the rate by which or at which it
4 degrades?

5 "ANSWER: No."

6 Did I read that correctly, Dr. Iakovlev?

7 A. "Which line? You didn't say the
8 line, at least I didn't hear it.

9 Q. Page 311, line 4 of your pre-trial
10 deposition. Do you see that?

11 A. I do.

12 Q. "QUESTION: So you can't tell me
13 the rate by which or at which it
14 degrades?

15 "ANSWER: No."

16 Did I read that correctly, Dr. Iakovlev?

17 A. Yes, you read it correctly.

18 Q. Thank you. And, Doctor, you can't
19 tell the jury how long it would take the mesh to
20 completely degrade in the body can you?

21 A. Well now 2016, since that deposition
22 I conducted several studies for degradation and
23 published literature.

24 Q. So my --

1 MR. ANDERSON: Do not interrupt him.

2 MR. HUTCHINSON: Absolutely. Move to
3 strike as nonresponsive. I'm not asking him about
4 the deposition any more. I have a different
5 question and you know it, Rich.

6 MR. FREESE: Counselor, he's going to
7 finish what he started and then you can move to
8 strike. Until then he's not going to answer any
9 more questions until you let him finish. You
10 either withdraw or let him finish. It's you.

11 MR. HUTCHINSON: My question --

12 MR. FREESE: No, no, you either withdraw
13 the question or you let him complete, those are
14 your two choices.

15 MR. HUTCHINSON: I'm not withdrawing the
16 question.

17 MR. FREESE: Well then he's going to
18 answer it.

19 MR. HUTCHINSON: But he's talking about
20 a deposition in 2016, a test in 2016. That's not
21 the question.

22 MR. FREESE: Vladimir, finish answering
23 the question.

24 THE DEPONENT: So that deposition took

1 place in 2014. Since that time I conducted
2 studies researching polypropylene degradation and
3 I published peer-reviewed articles describing my
4 findings. And since then I acquired way more
5 knowledge therefore we cannot compare what I know
6 now and what I knew at that time.

7 BY MR. HUTCHINSON:

8 Q. Move to strike as nonresponsive.

9 Dr. Iakovlev, you can't tell us how long
10 it would take for the mesh to completely degrade
11 in the body can you, sir?

12 A. I cannot.

13 Q. Thank you. Dr. Iakovlev, let's look
14 back at the photograph that's up there on the
15 screen, and that's Exhibit 7(C).

16 A. Yes.

17 Q. And it's my understanding that you
18 believe stain is trapped in the little nano
19 cavities. Am I correct on that?

20 A. Yes.

21 Q. And there are no nano cavities shown
22 in any of the photographs that you took, correct?

23 A. That's why they're nano because you
24 cannot see them. They are the nano scale size.

1 That resolution is not enough.

2 Q. And you can take down that
3 photograph.

4 The only way you can see -- let me be
5 clear. There are no nano cavities shown in the
6 photographs that you took for Jennifer Ramirez,
7 correct?

8 A. I just gave you an answer. They are
9 nano. There's -- the resolution of these images
10 of this study does not allow. The way we see it
11 is because it stains.

12 Q. And, Doctor, another way you can see
13 nano cavities is by doing transmission electron
14 microscopy, correct?

15 A. I don't think you can go all the way
16 to that resolution. It will definitely give you a
17 higher resolution but not all the way to those
18 pores where the dye is trapped.

19 Q. Dr. Iakovlev, if you'd turn with me
20 please to your deposition in the Ramirez case.
21 Are you with me?

22 A. Yes, I am.

23 Q. Page 79, line 23. Are you there
24 with me?

1 A. Yes.

2 Q. "QUESTION: And they are not any
3 nano cavities depicted in any of the
4 photographs that you've taken?

5 "ANSWER: No. The only way I could see
6 them, these little cracks, very fine
7 cracks, using transmission electron
8 microscopy."

9 Did I read that correctly, sir?

10 A. Yes, you did.

11 Q. And, Doctor, you have not done any
12 transmission electron microscopy in this case for
13 Jennifer Ramirez's have you?

14 A. I don't do it for any of the cases.
15 Transmission electron microscopy was done for
16 research.

17 Q. Doctor, when we look at Exhibit C?

18 A. Yes.

19 Q. And let's bring it back up, Exhibit
20 7(C). Doctor, you'll agree that some proteins can
21 polarize light won't you, sir?

22 A. To a degree.

23 Q. Thank you. And, Doctor when we look
24 at the bark that's shown in Exhibit 7(C) you've

1 never tried to isolate that bark for a chemical
2 analysis have you?

3 A. No.

4 Q. In fact you haven't had an
5 analytical chemist confirm that Ms. Ramirez's
6 Prolene in fact degraded have you, sir?

7 A. I didn't need to. I do my own
8 testing.

9 Q. And, Doctor, when we talk about
10 staining a stain is a soluble dye isn't it?

11 A. Most of them are.

12 Q. Thank you. And soluble means
13 something that dissolves in water like sugar
14 dissolves in water, correct?

15 A. Not all of them are soluble in water
16 some of them need to be dissolved in alcohol. It
17 depends on the dye. There are different dyes.
18 Some dyes are just exacts from plants.

19 Q. Doctor, soluble materials are washed
20 away with water aren't they?

21 MR. ANDERSON: Objection, asked and
22 answered.

23 THE DEPONENT: Yes and no. Unless they
24 have stronger bond to whatever surface they are

1 attached to they will not be washed by water.

2 Washing by water would be hydrostatic forces so
3 not all of them will be washed off.

4 BY MR. HUTCHINSON:

5 Q. And, Doctor, hematoxylin it's a
6 soluble dye isn't it?

7 A. Yes, it is.

8 Q. And eosin it's a soluble dye isn't
9 it?

10 A. Yes, but not in water it's in
11 alcohol.

12 Q. And, Doctor, H&E you talked about
13 this in your direct examination that stands for
14 hematoxylin and eosin, is that correct?

15 A. That's correct.

16 Q. And those are the chemicals that
17 were used in the staining process on the slides
18 that you showed the jury, is that right?

19 A. That's correct.

20 Q. And if you could pull up for us on
21 Exhibit 4(C), I'm sorry yeah, 4(C). Doctor, are
22 you there with me?

23 A. Which picture? Can you show it to
24 me?

1 Q. Yes, it's the third picture on
2 Exhibit 4. Right there.

3 A. Okay.

4 Q. I just want to make sure that you
5 and I are looking at the same thing. Are we?

6 A. Yes.

7 Q. Doctor, the chemical hematoxylin
8 stains blue or purple, right?

9 A. Yes.

10 Q. And eosin stains pink?

11 A. That's correct.

12 Q. And, Doctor, you understand that the
13 staining process used by a pathologist is an ionic
14 chemical reaction don't you, sir?

15 A. No, not all stains and in some cases
16 most of the dyes actually have very complex
17 staining mechanisms. They require additional
18 molecules, mordants. It's not just ionic.

19 Q. Well, hematoxylin is a positively
20 charged ion isn't it?

21 A. Hematoxylin is being transformed
22 during staining and there are different mordants.
23 I'm not sure if it always stays the same charge
24 and if charge has no -- has any effect during

1 staining, because there are different mordants
2 like iron and alum mordant so the answer is quite
3 complex.

4 Q. Doctor, you understand that
5 hematoxylin binds with negatively charged
6 substances in the body don't you, sir?

7 A. I gave you an answer. Most of the
8 dyes have very complex binding mechanisms. It's
9 not just electrostatic charge.

10 Q. And, Doctor, that's how hematoxylin
11 produces color isn't it?

12 A. That's how all of the dyes produce
13 color, through very complex binding mechanisms
14 which require not just dye but also other
15 molecules, mostly metals.

16 Q. Doctor, eosin, we've talked about
17 hematoxylin but I want to talk about eosin, the
18 other half, alright?

19 A. Okay.

20 Q. Eosin, it's a negatively charged ion
21 isn't it?

22 A. Possible.

23 Q. And eosin binds with charged
24 substances, positively charged substances in the

1 body, doesn't it?

2 A. Again, the process is not as simple
3 as something positively charged with being
4 attracted to negatively charged. The process is
5 complex and there are other forces involved in
6 staining.

7 Q. Move to strike as nonresponsive.

8 Doctor, my question is, eosin is
9 negatively charged and binds with positively
10 charged materials in the body, correct?

11 A. I gave you an answer several times
12 the same answer. You're trying to make it very
13 simple but it's not.

14 Q. Okay. Well, Doctor, let's turn to
15 the Bellew transcript where you testified in West
16 Virginia in front of the judge and jury? Do you
17 have that in front of you?

18 A. Yes.

19 Q. And turn with me to page 687. And
20 tell me when you're there, Dr. Iakovlev.

21 A. Yes, 687.

22 Q. And let's look at line 15.

23 A. Let me read the whole page.

24 Q. "QUESTION: And eosin is negatively

1 charged and binds with positively
2 charged materials in the body, correct?
3 "ANSWER: As far as I remember that's
4 the mechanism."

5 Did I read that correctly, Dr. Iakovlev?

6 A. Yes, you did.

7 Q. That was a pretty simple answer that
8 you gave to that question, right?

9 MR. FREESE: Objection to the form of
10 the question.

11 MR. ANDERSON: Object to the form and
12 you didn't read the remaining part of it. And if
13 we were sitting in front of a judge he or she
14 would make you read the remaining part of it for
15 completeness. And you didn't do that did you,
16 counsel?

17 BY MR. HUTCHINSON:

18 Q. Doctor, you can answer the question.
19 That was a pretty simple answer that you gave to
20 that question wasn't it?

21 MR. FREESE: Objection. Argumentative.
22 Don't answer it.

23 BY MR. HUTCHINSON:

24 Q. Are you refusing to answer that

1 question?

2 MR. FREESE: I'm instructing him not to
3 answer it. You're just arguing with him.

4 BY MR. HUTCHINSON:

5 Q. And, Doctor, let's look at page 687
6 line 18.

7 "QUESTION: Do you know the mechanism?

8 "ANSWER: I don't remember exactly what
9 happens with eosin but I think you're
10 right."

11 Did I read that correctly, sir?

12 A. You read it correctly.

13 Q. And, Doctor, when we talk about
14 whether or not hematoxylin has a positive or
15 negative charge, or eosin has a positive or
16 negative charge, all this means is that a material
17 will only stain if it chemically bonds with a
18 material of an opposite bond, correct?

19 A. This is absolutely wrong because I
20 explain you several times, the staining mechanisms
21 are very complex. You make it sound like plus,
22 minus, connect and nothing else. It does not work
23 like that. The mechanisms are very complex.
24 Polypropylene bark stains with multiple dyes,

1 blue, pink, green, purple and electrostatic charge
2 has nothing to do in the staining of polypropylene
3 bark.

4 Q. Move to strike as nonresponsive.

5 MR. ANDERSON: Just because you don't
6 like the answer --

7 BY MR. HUTCHINSON:

8 Q. I'm asking for a yes or no.

9 MR. ANDERSON: And he gave his answer.

10 BY MR. HUTCHINSON:

11 Q. Am I right or wrong, Doctor?

12 MR. ANDERSON: Asked and answered.

13 THE DEPONENT: You were wrong in your
14 question and your statement.

15 BY MR. HUTCHINSON:

16 Q. Doctor, let's talk about Prolene.
17 Prolene is hydrophobic isn't it?

18 A. That's correct.

19 Q. And that means it's not soluble in
20 water, correct?

21 A. That's correct.

22 Q. And Prolene does not dissolve in
23 water. We can agree on that can't we?

24 A. Yes.

1 Q. And Prolene is nonionic isn't it,
2 sir?

3 A. In any state? Degraded? I'm asking
4 you.

5 Q. Fair enough. Doctor, Prolene before
6 it's put in the body is nonionic isn't it, sir?

7 A. In that state, yes, it is not.

8 Q. And nonionic means it does not have
9 a charge, correct?

10 A. That's correct.

11 Q. Okay. And, Doctor, you don't know
12 the positive or negative components of oxidized
13 Prolene do you, sir?

14 A. But it doesn't matter because it
15 stains with multiple dyes. It's clear, it's one
16 hundred percent clear that electrostatic charge
17 has nothing to do with the staining mechanism
18 because it stains with multiple different dyes.
19 Any dye you apply to histological tissue will
20 stain the bark. I've stained it with different --
21 Ethicon scientists used phloxine, I used
22 trichrome, I use green stains, red stains, I used
23 at least six, seven different dyes. They all
24 stain it.

1 Q. Move to strike as nonresponsive.

2 My question, Doctor, is you don't know
3 the positive or negative components of oxidized
4 Prolene do you, sir?

5 A. Because it doesn't matter.

6 Q. Move to strike as nonresponsive.

7 I need a yes or no, Doctor. You don't
8 know the positive or negative components of
9 oxidized Prolene do you, sir?

10 MR. ANDERSON: Asked and answered. Go
11 ahead.

12 THE DEPONENT: As I said, it doesn't
13 matter that's why I don't know.

14 BY MR. HUTCHINSON:

15 Q. Move to strike everything before "I
16 don't know".

17 MR. ANDERSON: Well, I object to your
18 attempt to carve out what you like of his answer
19 and what you don't.

20 BY MR. HUTCHINSON:

21 Q. Doctor, let's talk about whether or
22 not degraded Prolene stains okay?

23 A. I thought we were talking about it
24 for the last 15 minutes or so.

1 Q. Well, we're going to talk about it a
2 little more specifically as far as the tests
3 you've done. Do you understand that?

4 A. I thought we were talking about
5 that. Okay.

6 Q. And, Doctor, you know what a control
7 for an experiment is don't you?

8 A. Yes.

9 Q. And just so I'm clear, but doctors
10 and scientists in Canada use controls when they do
11 experiments. Is that right, sir?

12 A. When you do experiment yes, when you
13 do --

14 MR. ANDERSON: Object to the form. Go
15 ahead.

16 THE DEPONENT: When you do experiments
17 in research, yes, you need a control. When you do
18 diagnostic work you don't need a control. You
19 don't have a control for each specimen you examine
20 and make a diagnosis.

21 BY MR. HUTCHINSON:

22 Q. And a control it's part of the
23 scientific process, agree?

24 A. Scientific, yes.

1 Q. Okay.

2 A. Diagnostic, no. There is no such a
3 thing as control for each specimen. It depends on
4 what you do.

5 Q. Doctor, you'll agree that using a
6 control is the hallmark of good science wouldn't
7 you?

8 MR. ANDERSON: Objection. Go ahead.

9 THE DEPONENT: I think we're talking
10 about different things.

11 BY MR. HUTCHINSON:

12 Q. Okay.

13 A. Science and research is one part,
14 one process, diagnostic work, examination of
15 routine, every-day specimens is completely
16 different process. One part needs controls, the
17 other part for the most part does not. It depends
18 on what you do.

19 Q. Dr. Iakovlev, a control increases
20 the reliability of the results, correct?

21 MR. ANDERSON: Objection to form.

22 THE DEPONENT: In what process? In the
23 research or diagnostic work?

24

1 BY MR. HUTCHINSON:

2 Q. In any scientific method, correct,
3 sir?

4 A. But we don't use controls in
5 diagnostic work.

6 Q. And, Doctor, in this case a control
7 would have been oxidized Prolene that stains
8 wouldn't it?

9 A. But this case was diagnostic work
10 where we don't have controls. We rely on our
11 knowledge and experience what is normal what is
12 not. Where have you seen a pathologist, even in
13 their pathology reports, where it says the control
14 was such-and-such tissue from a different patient?
15 It's not there. We don't function like this.

16 Q. Doctor, you haven't conducted a
17 controlled experiment to determine whether or not
18 oxidized Prolene stains have you, sir?

19 A. For Ms. Ramirez? For all other
20 diagnostic specimens? Or for research?

21 Q. Doctor, my question is as broad as
22 it gets. I'm asking for a yes or no. You haven't
23 conducted a control experiment to determine
24 whether or not oxidized Prolene stains have you,

1 sir?

2 A. Yes, I did. I see it every time,
3 every time I examine mesh specimen oxidized
4 Prolene is staining. I see it as oxidized.

5 Q. And, Doctor, you would need to
6 intentionally stain that Prolene when you're doing
7 this control wouldn't you, sir?

8 A. Can you repeat?

9 MR. ANDERSON: Objection to the form.

10 BY MR. HUTCHINSON:

11 Q. You would need to intentionally
12 stain the Prolene -- or I'm sorry. You would need
13 to intentionally oxidize the Prolene, correct?

14 MR. ANDERSON: Objection to form, and
15 objection as unintelligible.

16 THE DEPONENT: I don't exactly
17 understand. For what? What purpose exactly?

18 BY MR. HUTCHINSON:

19 Q. Doctor, the only way to prove that
20 oxidized Prolene stains is by purposefully
21 oxidizing Prolene and seeing how it reacts to H&E
22 stain, right?

23 A. No, this is wrong. This is not
24 correct.

1 Q. And, Doctor, you were doing an
2 experiment to determine if oxidized Prolene stains
3 weren't you?

4 A. No. I was doing an experiment
5 testing if there can be a model which can model
6 oxidation in vivo.

7 Q. And, Doctor, you haven't finished
8 those tests have you?

9 A. Yes, but we are talk about something
10 completely different for a different purpose.

11 Q. Well, Doctor, my question is do you
12 have a control for Ms. Ramirez's case that shows
13 oxidized Prolene stains, yes or no?

14 A. But we are talking about this for 15
15 minutes. We do not have controls for each
16 diagnostic specimen. It's not how the diagnostic
17 work is done. I mean you're asking for something
18 which is never done.

19 Q. And I'm just asking is the answer
20 no?

21 A. You're asking about something which
22 is never done. There are no controls for
23 diagnostic specimens.

24 Q. And you were doing a diagnostic

1 specimen for Ms. Ramirez, correct?

2 A. That's correct.

3 MR. FREESE: When you get to a good spot
4 let's take a break.

5 MR. HUTCHINSON: Rich, probably five
6 minutes or do you need earlier?

7 MR. FREESE: Five minutes is fine. I'm
8 actually worried about our court reporter than
9 anyone else.

10 MR. HUTCHINSON: Then let's take a
11 break.

12 THE VIDEOGRAPHER: Going off the record
13 at 3:26 p.m.

14 --- Break taken.

15 THE VIDEOGRAPHER: We're back on the
16 record at 3:43 p.m.

17 BY MR. HUTCHINSON:

18 Q. Dr. Iakovlev, I believe it's your
19 testimony that degradation caused Prolene to
20 become brittle, is that right?

21 A. That's correct.

22 Q. And you're not a material scientist?

23 A. I'm not.

24 Q. You're not a polymer scientist?

1 A. I'm not.

2 Q. You're not an analytical chemist?

3 A. I'm not.

4 Q. You haven't consulted with anyone in
5 those fields about Ms. Ramirez's explant have you,
6 sir?

7 A. I have not.

8 Q. And you would agree that if the
9 Prolene was brittle then that would affect the
10 physical properties of the mesh?

11 A. That's correct.

12 Q. And, Doctor, analytical chemists
13 they have equipment to analyze materials, don't
14 they?

15 A. Yes, they do. That's what they do.

16 Q. Like FTIR, is that right?

17 A. That's correct.

18 Q. And FTIR is just a way to determine
19 the fingerprint of a chemical. Is that fair to
20 say?

21 A. It can be used as an analogy.

22 Q. And gel permeation chromatography,
23 that's a way to determine loss of molecular
24 weight, is that correct?

1 A. One ways.

2 Q. And, Doctor, you've never done an
3 FTIR or any other type of forensic spectroscopy on
4 Ms. Ramirez's mesh have you?

5 A. No.

6 Q. And you've never done any molecular
7 weight testing on Ms. Ramirez's mesh have you?

8 A. No.

9 Q. You didn't measure the tensile
10 strength?

11 A. No.

12 Q. You didn't measure the elongation?

13 A. No.

14 Q. You didn't measure the toughness?

15 A. No.

16 Q. In fact you didn't do any type of
17 bench-top testing to determine whether or not the
18 physical properties decreased did you, sir?

19 A. What do you mean "bench top"? You
20 mean like wet lab experimental testing? I have
21 not.

22 Q. And, Doctor, in fact you haven't
23 done any type of analytical chemistry testing on
24 Ms. Ramirez's explant, have you?

1 A. No.

2 Q. Doctor, I assume that your opinion
3 is that oxidation is what is causing the
4 degradation that you spoke about this morning, is
5 that correct?

6 A. Well, that's the current knowledge
7 and current understanding that oxidation triggers
8 degradation.

9 Q. And is that your understanding?

10 A. That's my understanding.

11 Q. Okay. But now doctor, you can't
12 testify to a reasonable degree of scientific
13 certainty that oxidation is what's causing the
14 degradation, can you?

15 MR. ANDERSON: Objection to form.

16 THE DEPONENT: Well, I can testify that
17 the body of the literature indicates that
18 oxidation is the most probable mechanism of
19 degradation.

20 BY MR. HUTCHINSON:

21 Q. Move to strike as nonresponsive.

22 My question, Doctor, is whether or not
23 you can testify to a reasonable degree of
24 scientific certainty that the oxidation is what is

1 causing degradation?

2 A. Yes, that's what I said, to
3 reasonable degree of scientific certainty. All
4 body of literature indicates that this is most
5 probable mechanism of degradation.

6 Q. Doctor, when we talk about oxidation
7 that's the addition of an oxygen atom through the
8 chemical structure, isn't it?

9 A. Yes, in part. It may not stay there
10 forever but it involves oxygen.

11 Q. And you understand that if oxidation
12 occurs you must have a loss of molecular weight?

13 MR. ANDERSON: Objection.

14 THE DEPONENT: I think now we're going
15 into an area that is beyond my expertise, into
16 chemical analysis.

17 BY MR. HUTCHINSON:

18 Q. You can't answer that question, is
19 that correct?

20 A. No, it's not my area of expertise.

21 Q. And just so I'm clear, from a
22 chemistry standpoint you cannot answer that
23 question, is that right?

24 MR. ANDERSON: Objection, asked and

1 answer. He just said he can't do, it's outside of
2 his field and we're not offering him for chemical
3 analysis, or any of those other issues that you're
4 going through. You know that's for polymer
5 scientists. So he gave you the answer. It's the
6 same answer again. We're not offering him for
7 that.

8 BY MR. HUTCHINSON:

9 Q. You can answer, Doctor.

10 A. My answer is that I am not a
11 chemical scientist. I did not do chemical
12 testing.

13 Q. Well, Doctor, let's look at your
14 expert report on page 1 for Mr. Ramirez. You're
15 there, yes, sir?

16 A. Yes.

17 Q. The last line, "I am knowledgeable
18 in the areas of chemistry." Did I read that
19 correctly, sir?

20 A. Well let's read the full sentence.

21 "I am knowledgeable in the areas of
22 chemistry, hematology, microbiology,
23 serology, immunology and other special
24 laboratory studies as they relate to my

1 practice of pathology."

2 Q. Thank you. And, Doctor, you're not
3 an expert in chemistry as it relates to oxidation
4 are you? Dr. Iakovlev?

5 A. Well, you ask a very broad question
6 and --

7 Q. My question is simple. You're not
8 an expert in chemistry as it relates to oxidation
9 are you, sir?

10 A. Oxidation happens all the time.
11 Burning a fire is oxidation. I mean, you ask a
12 question so broad. Yes, I am an expert in some
13 parts of oxidation. I mean, if you ask me what
14 happens when something burns, oxidizes fast I can
15 tell you. In terms of polymer science, how this
16 happens I'm not an expert in that field.

17 Q. Doctor, you'll agree that if
18 oxidation occurs strong carbonyls -- strike that.

19 If oxidation occurs FTIR must show
20 strong carbonyl bands, you'll agree with that
21 wouldn't you?

22 A. I have no opinion regarding that
23 because as I told you I'm not a chemical
24 scientist.

1 Q. And, Doctor, if oxidation occurs
2 there will be a loss of toughness and tensile
3 strength and elongation, correct?

4 MR. ANDERSON: Objection. He just said
5 that this is outside of his area of specialty.
6 Are you just going to keep asking him questions
7 and he can just say it every time?

8 BY MR. HUTCHINSON:

9 Q. Is that outside of your area of
10 expertise, Doctor?

11 A. That's correct.

12 Q. And, Doctor, you're unaware of any
13 peer-reviewed literature that shows Prolene has
14 loss molecular weight in body, correct?

15 A. The same answer. I'm not a chemical
16 scientist. I do not focus on that aspect. There
17 might be some literature, because it's outside of
18 my area of expertise I am not focus on this
19 question when I review articles.

20 Q. And, Doctor, you're unaware of any
21 studies that show Prolene has lost molecular
22 weight in the body, correct?

23 MR. ANDERSON: Objection, asked and
24 answered.

1 THE DEPONENT: I just answered the
2 question. Since I am not a chemical scientists
3 when I review this literature I am not focusing on
4 that specific topic. There may or may not be
5 literature out there answering your question.

6 BY MR. HUTCHINSON:

7 Q. Dr. Iakovlev, you can't tell the
8 jury the chemical structure of oxidized Prolene
9 can you?

10 A. The same answer. Do you want me to
11 repeat?

12 MR. ANDERSON: He said same answer.
13 It's outside of his expertise.

14 BY MR. HUTCHINSON:

15 Q. Is that outside of your area of
16 expertise?

17 A. Yes, that's correct.

18 Q. And, Doctor, you're not an expert in
19 the direct oxidation of polypropylene are you?

20 A. No. Well, I can show what happens
21 in the histological sections with degraded
22 polypropylene, but what happens in terms of
23 chemical reactions would be area of expertise for
24 material scientists.

1 Q. So my question is you're not an
2 expert in the direct oxidation of polypropylene.
3 Yes or no?

4 MR. ANDERSON: He just answered it. He
5 doesn't have to give you a yes or no. And in fact
6 he --

7 MR. HUTCHINSON: I just want to know if
8 he's an expert.

9 MR. ANDERSON: Well, he gave you the
10 answer.

11 BY MR. HUTCHINSON:

12 Q. You can answer, Doctor.

13 A. I'm an expert in terms of how the
14 process of degradation changes properties of
15 polypropylene in histological sections. I am not
16 an expert in chemical reactions behind.

17 Q. Doctor, let's look at what you told
18 the jury in Bellew on page 689. Page 689, line 6.
19 Tell me when you're there.

20 A. Yes.

21 Q. Question, it's the same question I
22 just asked you.

23 "Doctor, you're not an expert in the
24 direct oxidation of polypropylene?

1 "ANSWER: That's correct."

2 Did I read that correctly?

3 A. You have to give me a second to see
4 exactly what questions are asked.

5 MR. ANDERSON: And, again, improper use
6 of impeachment. He said in his answer, "I am not
7 an expert in chemical reactions behind
8 degradation." I don't know what you're trying to
9 get at, counsel.

10 MS. VERBEEK: Can we agree on the
11 record, because I'm cutting in and out, that one
12 objection is good for all?

13 MR. HUTCHINSON: Sure. Absolutely.

14 MS. VERBEEK: Thank you.

15 MR. HUTCHINSON: You're

16 BY MR. HUTCHINSON:

17 Q. Dr. Iakovlev, did I read that
18 correctly?

19 A. Okay. Let's go back to the same --
20 which page and which line did you read?

21 Q. Doctor, page 689, line 6.

22 "It's fair to say, isn't it, Doctor,
23 that you're not an expert in the direct
24 oxidation of polypropylene?

1 "Answer: That's correct."

2 Did I read that correctly, Dr. Iakovlev?

3 A. Yes, you read it correctly.

4 Q. Thank you. And, Doctor, we talked
5 about this earlier but you know that Prolene is
6 the brand name for Ethicon's mesh, right?

7 A. Yes.

8 Q. And you know that Prolene is made
9 out of polypropylene plus special additives, is
10 that correct?

11 A. That's correct.

12 Q. And in fact that's what makes
13 Prolene different than other meshes on the market.
14 Is that correct, sir?

15 MR. FREESE: Object to the form and the
16 question.

17 THE DEPONENT: I don't think I can
18 answer that question. I don't know if it is
19 different and if that's the only thing which makes
20 it different.

21 BY MR. HUTCHINSON:

22 Q. That's outside of your area of
23 expertise?

24 A. Yes.

1 Q. And so you can't tell us the names
2 of antioxidants that Ethicon adds to polypropylene
3 to make Prolene can you, sir?

4 A. No, I cannot.

5 Q. And you can't tell the jury how
6 those antioxidants prevent oxidation can you, sir?

7 A. No, I cannot. I know that they need
8 to be used because it degrades, that's why it's
9 being used.

10 Q. In fact you can't tell the jury the
11 names of the antioxidants that are used can you,
12 sir?

13 MR. ANDERSON: Objection. Asked and
14 answered. Go ahead.

15 THE DEPONENT: I cannot.

16 BY MR. HUTCHINSON:

17 Q. I'm sorry?

18 A. I cannot.

19 Q. Thank you.

20 A. I can tell you that Ethicon needs
21 antioxidants in polypropylene to delay
22 degradation.

23 Q. And, Doctor, you've never done an
24 analysis to determine or quantify the rate at

1 which these antioxidants are depleted have you,
2 sir?

3 MR. ANDERSON: Well he just said he
4 didn't know what they are so how in the world is
5 he going to know if they're depleted? But
6 objection.

7 BY MR. HUTCHINSON:

8 Q. Is that correct, Doctor? Is that
9 correct, sir?

10 A. That's correct.

11 Q. Thank you. And, Doctor, you showed
12 the jury the slice of wood earlier. Do you
13 remember that?

14 A. Yes, I do.

15 Q. And do you still have it with you?

16 A. Yes, I do.

17 Q. And why don't you put it up there on
18 the table?

19 A. Sure.

20 Q. And by the way where did you get it?
21 Where did you get that wood? From the plaintiff's
22 lawyer?

23 MR. ANDERSON: Objection.

24 THE DEPONENT: Um ...

1 BY MR. ANDERSON:

2 Q. Doctor?

3 MR. ANDERSON: The same objection.

4 BY MR. HUTCHINSON:

5 Q. Did you get that wood from the
6 plaintiff's lawyer?

7 A. This one? This specific?

8 Q. Yes, sir.

9 A. Yes, it was brought by plaintiff's
10 lawyer.

11 Q. And if you'll hold it up right
12 there. Now, you use this piece of wood to
13 demonstrate that there's nothing wrong with the
14 core, is that right?

15 A. Yes.

16 Q. Okay. Now, Dr. Iakovlev, I want to
17 hand you another piece of wood.

18 A. Yes.

19 MR. ANDERSON: Plaintiff's lawyer give
20 you that one.

21 MR. FREESE: We looked at that one
22 yesterday too.

23 BY MR. ANDERSON:

24 Q. Move to strike.

1 Dr. Iakovlev, you have never seen a
2 fiber from a mesh explant have a crack like that
3 have you, sir?

4 A. Which one? Like this?

5 Q. Yes, sir.

6 A. When there is chattering in specific
7 conditions they're in artifact which cracks the
8 fibers.

9 Q. And my question, sir -- why don't
10 you hold the smaller piece up?

11 A. Yes.

12 Q. Just the smaller one, I know the
13 bigger one's heavy. You've never seen a fiber
14 under the microscope that looks like that have
15 you, sir?

16 A. Not artifact.

17 MR. HUTCHINSON: Object to the form of
18 the question.

19 THE DEPONENT: No, I have never seen it.

20 BY MR. HUTCHINSON:

21 Q. Thank you. And, Doctor, by the way
22 that wood, let's look at the exhibit that you used
23 in your direct exam.

24 A. Okay.

1 Q. That wood's never been in the body
2 has it?

3 A. No.

4 Q. And if it had been in the body it
5 would be covered with proteins wouldn't it, sir?

6 MR. ANDERSON: Objection.

7 THE DEPONENT: Yes.

8 BY MR. ANDERSON:

9 Q. And in fact it would be coated,
10 using your own words, with proteins wouldn't it,
11 sir?

12 A. I wouldn't say coated, it would
13 probably be soaked into the pores of the bark
14 here.

15 Q. And, Doctor, you testified this
16 morning that eosin stains proteins pink, correct?

17 A. Yes.

18 Q. And, Doctor, let's look at your
19 Exhibit 1, which is Ms. Ramirez's report?

20 A. Yes.

21 Q. And if you'll turn with me please to
22 page 25? And let's look at Exhibit 17(A).

23 A. Page 25. Of which report?

24 MR. ANDERSON: Of the case-specific

1 report or the general report?

2 BY MR. ANDERSON:

3 Q. Yes, case specific. Page 25, figure
4 JR(17)(A).

5 A. Yes.

6 Q. And, Doctor, why don't you hold that
7 up for the jury so they can see it please? And
8 Doctor, you testified earlier that eosin stains
9 proteins pink. Do you remember that?

10 A. Yes.

11 Q. And, Doctor, you'll agree that the
12 outer layer that in the picture that you've
13 labelled JR(17) is pink, correct?

14 A. More purple.

15 Q. Would you show it to the jury?

16 A. The outer part.

17 Q. My question, Doctor, is really
18 simple.

19 MR. ANDERSON: He's trying to answer
20 your question.

21 MR. HUTCHINSON: No, he's not. My
22 question is very simple.

23 MR. ANDERSON: Yes he is. Just because
24 you say he's not doesn't mean he's not.

1 MR. HUTCHINSON: Absolutely. Just
2 because you say he is doesn't mean he is.

3 MR. ANDERSON: Oh God. He's going to
4 answer your question the way he's going to answer
5 it. You want to move to strike it? Move to
6 strike it.

7 MR. HUTCHINSON: I'll be happy to.

8 MR. ANDERSON: I'm sure you would.

9
10 BY MR. HUTCHINSON:

11 Q. Dr. Iakovlev?

12 A. Yes.

13 Q. You'll agree that the outer layer
14 that you're showing the jury is pink. Yes or no?
15 Can you answer that question yes or no?

16 A. I cannot answer that question yes or
17 no. I have to give you a full answer. And the
18 full answer will be that the outer portions of the
19 bark, the very edge of this is more pink. There
20 are more proteins on the surface but when we go
21 deeper down the intensity of color drops and it
22 becomes more purple.

23 Q. Move to strike everything after "I
24 cannot answer yes or no".

1 Dr. Iakovlev, you discussed in your
2 direct examination some literature this morning.
3 Do you remember that?

4 A. Yes, I do.

5 Q. And in fact let's look at some of
6 that literature. Let's look at Exhibit 20. I'm
7 sorry, Exhibit 19.

8 A. Just give me a second.

9 Q. Pathology of Explanted Transvaginal
10 Meshes.

11 A. This is Exhibit 20.

12 Q. Exhibit 19.

13 A. Oh 19. Okay.

14 Q. Pathology of Explanted Transvaginal
15 Meshes. Do you see that, Doctor?

16 A. Yes, I do.

17 Q. And this is a publication that you
18 authored, correct?

19 A. That's correct.

20 Q. And it was published in 2014, is
21 that right?

22 A. That's correct.

23 Q. And, Doctor, you were a paid expert
24 witness for the plaintiffs at the time of this

1 study weren't you? In 2014?

2 A. Yes.

3 Q. And if we look at that very top
4 paragraph in the abstract do you see that?

5 A. Yes, I do.

6 Q. And if you can pull that up? And I
7 want you to read the very first sentence of the
8 paper you authored.

9 "The use of polypropylene mesh
10 devices for pelvic organ prolapse
11 spread rapidly during the last decade
12 yet our knowledge of the mesh tissue
13 interaction is far from complete."

14 A. That's correct.

15 Q. Did I read that correctly, sir?

16 A. You read it correctly.

17 Q. Thank you. And let's look at the
18 other paper that you authored, it's Exhibit 20.

19 A. Yes.

20 Q. And it's titled "Degradation of
21 polypropylene In Vivo Microscopic Analysis". Do
22 you have that paper in front of you, Doctor?

23 A. Yes, I do.

24 Q. In fact you were a paid expert

1 witness for the plaintiffs at the time of this
2 study weren't you?

3 A. Yes, I was.

4 Q. And, Doctor, this paper was
5 published by you in July of 2015, is that correct?

6 A. That's correct.

7 Q. And in fact that's less than a year
8 ago isn't it, sir?

9 A. That's correct.

10 Q. And let's look at the abstract. And
11 on the left-hand side paragraph in the middle it
12 says, "The fundamental question", do you see that?

13 A. I do.

14 Q. And Doctor, you write, "The
15 fundamental question as to whether polypropylene
16 degrades in the body is still debated." Did I
17 read that correctly?

18 A. That's correct. That's what we're
19 doing right now.

20 Q. And in fact, Doctor, let's look at
21 the first page. You can pull that down. And the
22 last sentence under the paragraph "Introduction".
23 Doctor, you write, just less than a year ago, "The
24 causes and mechanisms of complications associated

1 with the mesh remain incompletely understood."

2 Did I read that correctly, sir?

3 A. That's correct.

4 Q. And in fact you go on to write, for
5 example, "The fundamental question as to whether
6 or not polypropylene degrades in the body is still
7 unresolved." Did I read that correctly?

8 A. That's correct.

9 Q. And, Doctor, let's look at some more
10 literature that you cite.

11 A. Sure.

12 Q. I would like to turn your attention
13 to Exhibit 8 this is the Celine Mary article,
14 correct?

15 A. Well let me first pull the exhibit.
16 Yes.

17 Q. And this is one of the documents
18 that you relied on in reaching your opinions, is
19 that correct, sir?

20 A. That's correct.

21 Q. And if we look at the first
22 paragraph on the first page it says,

23 "Polypropylene", and I'll give the --

24 "Polypropylene was introduced as a suture material

1 in the late 1950s." Did I read that correctly?

2 A. Yes.

3 Q. "And it has a high flexibility and
4 tensile strength and exhibits low thrombogenicity
5 and tissue reaction." Did I read that correctly?

6 A. Well with little mistake but for the
7 most part, yes.

8 Q. But I did read the fact that it
9 exhibits low tissue reaction correctly didn't I,
10 sir? If you can highlight it please.

11 "Polypropylene exhibits low thrombogenicity and
12 tissue reaction." Did I read that correctly, sir?

13 A. Yes, now you've read it correctly.

14 Q. Thank you. And let's look at the
15 Jogenbloed article, Doctor.

16 A. Exhibit number?

17 Q. Exhibit 13.

18 A. Yes.

19 Q. And if we look at the title, that's
20 the only thing I want to look at on this document.

21 A. Yes.

22 Q. It says "Degradation of
23 Polypropylene in the Human Eye". Did I read that
24 correctly?

1 A. Yes. It degrades in the eye, in
2 degrades in other tissues.

3 Q. And, Doctor, you understand that UV
4 light degrades polypropylene don't you?

5 A. Yes.

6 Q. And, Doctor, vaginal mesh isn't
7 exposed to UV light in the pelvic region is it,
8 sir?

9 A. Not in normal conditions.

10 Q. Thank you. Let's look at Exhibit
11 15, Doctor, that's the Leibert study.

12 A. Yes.

13 Q. In fact this is another document
14 that you relied on in support of your opinions,
15 correct?

16 A. Yes.

17 Q. And let's look at the very last line
18 in the summary on the first page. It says,
19 "Long-term effects of polymer implantation upon
20 tissue were not studied in this work." Did I read
21 that correctly, sir?

22 A. That's correct.

23 Q. And in fact, Doctor, you understand
24 from reading the Leibert article that the

1 scientists studied one filament with antioxidants
2 and one filament without antioxidants, correct?

3 A. I don't remember if it was just one
4 filament but they compare polymer with
5 antioxidants and without oxidants.

6 Q. Thank you. And in fact they
7 compared those after putting it in hamsters, is
8 that correct?

9 A. That's correct.

10 Q. And, Doctor, if you look with me on
11 the last page of the Leibert article

12 A. Yes.

13 Q. Page 950 please. It's --

14 A. The second last.

15 Q. Yes, the second-to-last, top
16 paragraph. The paragraph that charts with, "No
17 changes".

18 A. Yes.

19 Q. "No changes in mechanical
20 properties or infrared spectra were
21 observed for any of the filaments
22 containing antioxidants which were
23 implanted."

24 Did I read that correctly, sir?

1 A. Yes, at the time when they analyzed
2 that.

3 Q. Thank you. And if we look at the
4 "Conclusions" section?

5 A. I do.

6 Q. If we leave -- if we read the very
7 last line in number 5 it says:

8 "These results support the view
9 that the changes observed for pure
10 implanted filaments are due to
11 oxidation rather than diffusional or
12 other unknown effects since the
13 antioxidant specifically inhibits
14 and/or retards oxidation."

15 Did I read that correctly, sir?

16 A. Yes, you read it correctly.

17 Q. Thank you. And let's look at
18 Exhibit 18, which was the Wood article.

19 A. Yes.

20 Q. Dr. Iakovlev, you relied on this for
21 your opinions didn't you, sir?

22 A. Yes, I did.

23 Q. And Dr. Iakovlev, you'll agree that
24 the Wood article doesn't even discuss a product

1 made of Prolene does it, sir?

2 MR. ANDERSON: Objection.

3 THE DEPONENT: I can't agree with you.

4 It says "polypropylene".

5 BY MR. ANDERSON:

6 Q. Move to strike as nonresponsive.

7 I'm talking about Prolene, sir, not

8 polypropylene but Prolene.

9 A. But Prolene and polypropylene are
10 the same things.

11 Q. Dr. Iakovlev, you've already told me
12 you're not an analytical chemist, correct?

13 A. Correct.

14 MR. ANDERSON: Objection.

15 BY MR. HUTCHINSON:

16 Q. Alright. So you'll agree that the
17 Wood article says nothing about Prolene in it,
18 correct?

19 A. They don't use word "Prolene"

20 Q. Thank you.

21 A. That would be a correct statement.

22 Q. Thank you.

23 A. But it doesn't mean that they didn't
24 use polypropylene.

1 Q. Thank you. And, Doctor, if you look
2 at page 117 of the Wood article, 1117 to be exact.

3 A. Yes.

4 Q. You'll see that the authors have an
5 FTIR spectra there?

6 A. Yes.

7 Q. I'm waiting for the IT folks to
8 catch up. There it is. Thank you.

9 And, Doctor, you'll see that there's a
10 carbonyl peak at 1740. Do you see that?

11 A. I am not a material scientist. I
12 cannot interpret this graph.

13 Q. So you can't interpret whether or
14 not this oxidized -- the polypropylene oxidized in
15 this study can you, sir?

16 A. I'm not using -- I'm not familiar
17 with this technique.

18 Q. I'm sorry?

19 A. I'm not using it. I'm not familiar
20 with the technique. I cannot interpret this
21 graph.

22 Q. Thank you. In fact you can't
23 interpret any spectra in the Wood article you,
24 sir?

1 A. No.

2 Q. In fact, Doctor, you've never seen
3 an FTIR spectra for oxidized Prolene from the body
4 have you, sir?

5 A. Well, I've seen articles publishing
6 it. That's the extent of my knowledge.

7 MR. HUTCHINSON: We're going to take a
8 break, counsel.

9 THE VIDEOGRAPHER: Going off the record
10 at 4:13 p.m.

11 --- Break taken.

12 THE VIDEOGRAPHER: We're back on the
13 record at 4:22 p.m.

14 BY MR. HUTCHINSON:

15 Q. Dr. Iakovlev, we just took a break,
16 are you ready to go?

17 A. Yes.

18 Q. I want to talk about what you do at
19 the hospital in Canada where you work, okay?

20 A. Okay.

21 Q. As a pathologist you study tissue
22 that's been removed from patients, is that right?

23 A. That's correct.

24 Q. And then you make slides kind of

1 like the ones that you showed the jury earlier, is
2 that right?

3 A. Well my lab makes the slides.

4 Q. Okay. But more or less what you do
5 as a pathologist is that you review slides and
6 reach conclusions about a patient's illness or
7 disease, is that right?

8 A. Well I analyze them in view of the
9 history, connect clinical information with
10 pathological information and then arrive to
11 diagnosis.

12 Q. Doctor, you'll agree that it's
13 important to never mix up a patient's tissue
14 samples, correct?

15 A. Yes.

16 Q. So if we're looking for cancer
17 cells, for example, that would be a bad thing to
18 mix up a patient's tissue samples, is that
19 correct?

20 A. That's correct.

21 Q. In fact, Doctor, you would never
22 trust a pathologist who repeatedly mixed up tissue
23 samples would you?

24 MR. ANDERSON: Objection.

1 THE DEPONENT: Yes. I mean, this is
2 basic principles that we have to keep track of
3 what is coming from which patient.

4 BY MR. HUTCHINSON:

5 Q. It's a basic principle that tissue
6 samples should always be accounted for, is that
7 right?

8 A. Yes.

9 Q. Okay. And a pathologist should
10 never mix up tissue samples should they, sir?

11 A. No. I mean, they shouldn't mix up
12 -- I mean there are some situations when it does
13 not matter and some situation where it matters.
14 In most cases it matters.

15 Q. But if it did happen you'd be
16 skeptical of that pathologist's work wouldn't you,
17 sir?

18 A. Well it may happen at different
19 stages. It doesn't have to be pathologist's
20 fault. There are several reasons why it can
21 happen. I mean, when there are large volumes
22 things happen. We try to keep them low, as low as
23 possible.

24 Q. Doctor, have you ever mixed up

1 tissue samples?

2 A. We had some mix-ups. I mean, this
3 happens all the time. Some of the samples I
4 signed out we had these problems. We caught them
5 and corrected the errors.

6 Q. Was that at St. Michael's Hospital
7 in Canada?

8 A. Yes.

9 Q. Were you reprimanded for that,
10 Doctor?

11 A. What do you mean?

12 Q. Were you reprimanded by any type of
13 medical authority for that happening, sir?

14 A. No, I mean it wasn't my fault.

15 Q. Doctor, you have given opinions
16 against Ethicon in the Husky Edwards case, is that
17 correct?

18 A. Yes.

19 Q. And I want to hand you what's been
20 marked as Exhibit 9 to your deposition.

21 ---DEFENSE EXHIBIT NO. 9: Rule 26
22 expert report of Dr. Vladimir Iakovlev
23 re. Jo Husky, et al., and Tonya
24 Edwards, et al.

1 BY MR. HUTCHINSON:

2 Q. This is a copy of the report that
3 you prepared against Ethicon. Is that right, sir?

4 A. Yes.

5 Q. And you signed and dated this
6 report, is that correct?

7 A. Yes. I don't see a date of this
8 report.

9 Q. Well, I want to make sure I have the
10 right copy so let's look at page 74. That's your
11 signature on page 74, is that correct, sir?

12 A. Yes, it is.

13 Q. And Doctor, certainly you proofread
14 this before you signed it, correct?

15 A. Yes, I do read reports when I sign
16 them.

17 Q. And, Doctor, let's look at page 22
18 of the report that you did for Ms. Edwards. Are
19 you there?

20 A. Yes.

21 Q. And, Doctor, you identify two
22 pictures as Ms. Edward's mesh explant, correct?

23 A. That's correct.

24 Q. And there's a picture on the top and

1 a picture on the bottom?

2 A. Yes.

3 Q. And both of these pictures were
4 important to your opinion in the Edward's case,
5 weren't they?

6 A. To a degree.

7 Q. And Ms. Edwards received an Ethicon
8 mesh didn't she, sir?

9 A. Yes.

10 Q. And, Doctor, I've handed you a black
11 Sharpie pen. Would you circle the top picture for
12 us, please?

13 MR. ANDERSON: I'm going to object to
14 the relevance of all this line of questioning
15 about Husky Edwards.

16 BY MR. HUTCHINSON:

17 Q. Circle the top picture for us
18 please, sir.

19 A. Okay.

20 Q. And I want you to write down at the
21 bottom "Edwards Ethicon" so that the jury can
22 understand it and review it. And, Dr. Iakovlev,
23 you've also given testimony against American
24 Medical Systems, is that correct?

1 A. That's correct.

2 Q. I want to hand you what's been
3 marked as Exhibit 10 to your deposition.

4 A. Yes.

5 ---DEFENSE EXHIBIT NO. 10: Addendum to
6 the Rule 26 expert report of
7 Dr. Vladimir Iakovlev re. Lisa Marie
8 Fontes, et al.

9 BY MR. HUTCHINSON:

10 Q. And this is the document or the
11 report that you signed for Lisa Marie Fontes, is
12 that correct? Doctor?

13 A. Um, on page 10 I see John Serrano
14 specimen.

15 Q. No, we're talks about Exhibit 10.
16 That's Exhibit 10.

17 A. Yes.

18 Q. My question is, this is the report
19 that you prepared against American Medical Systems
20 for Lisa Marie Fontes, is that correct?

21 A. That's correct.

22 Q. And Ms. Fontes received an American
23 Medical Systems mesh didn't she, sir?

24 A. Yes.

1 Q. And that's a company that's
2 completely different from Ethicon isn't it?

3 A. Yes.

4 Q. And, Doctor, if you look on page 18
5 of that report, figure 6. Do you see that figure,
6 Doctor? Dr. Iakovlev, do you see figure 6 on page
7 18?

8 A. Well there are two figures in figure
9 6, there is top row figures and bottom row.

10 Q. And, Doctor, if you'll get your pen
11 and circle the bottom left photograph for the jury
12 please. Bottom left.

13 A. Yes, but the entire figure contains
14 two panels, upper panel and lower panel.

15 Q. I understand. And, Doctor, your
16 lawyer is going to get to ask you some question.

17 A. Okay.

18 Q. But I'm just asking you just the
19 bottom left picture. You circled two pictures.
20 Just the bottom left picture.

21 A. It's the same picture. One is
22 labeled one is not.

23 Q. And, Doctor, will you please write
24 "AMS" by that photograph?

1 A. Um, I did not say that that specific
2 is AMS. Why are you making me to do something
3 which I did not do?

4 MR. ANDERSON: Don't do it.

5 BY MR. HUTCHINSON:

6 Q. Dr. Iakovlev, would you look at the
7 bottom of that paragraph please and you write "AMS
8 mesh explants." Don't you, sir?

9 A. Yes, but there are two panels, one
10 is panel on the top and then one panel on the
11 bottom.

12 Q. Move to strike as nonresponsive.
13 You write "AMS mesh explants", correct?

14 A. That's correct.

15 Q. And in fact, Doctor, I want you to
16 hold these up for the jury, please. And in your
17 right hand you have an AMS explant mesh, correct?

18 A. Yes, with two panels.

19 Q. And in your left hand you have an
20 Ethicon mesh don't you, sir?

21 A. Yes, I do.

22 Q. And, Doctor, those pictures that
23 you've circled are identical aren't they?

24 A. The bottom one here and the top one

1 here, yes, they are. Not the top one here.

2 Q. And that tissue couldn't have
3 belonged to Ms. Edwards who had an Ethicon mesh
4 and somebody else who had an AMS mesh could it?

5 A. No.

6 Q. In fact --

7 A. Wait a second. This is not specific
8 to a specific patient because it does not identify
9 any patient under these figures. What it does it
10 combines representative images of thrombosed
11 vessels. One of them is Ethicon, one of them is
12 AMS. This one is for specific patient and, yes,
13 one of the images in this specific report was from
14 Ethicon the other one from AMS.

15 Q. Right. In fact, Doctor, you
16 included an AMS picture in your Ethicon report
17 didn't you, sir?

18 A. Did I say that it was just limited
19 to AMS samples?

20 Q. Doctor, I need you is to stick with
21 me please on page 18.

22 A. Yes, it was --

23 Q. And I need you to show the jury --

24 A. So --

1 Q. Excuse me, sir, I'm going to get to
2 ask the questions, okay?

3 MR. ANDERSON: Well, he's trying to
4 answer your questions.

5 BY MR. HUTCHINSON:

6 Q. And, Doctor, I need you to show that
7 picture right beside your Ethicon report.

8 MR. ANDERSON: He just did that.

9 THE DEPONENT: I just did it.

10 BY MR. HUTCHINSON:

11 Q. And, Doctor, write "AMS".

12 MR. FREESE: No, we're not going to be
13 modifying exhibits. They say what they say.

14 BY MR. HUTCHINSON:

15 Q. Absolutely.

16 MR. ANDERSON: If you want to write it
17 on there you write it on there. If you want to
18 show it to the jury you show it to the jury but
19 you're not going to make him do it.

20 BY MR. HUTCHINSON:

21 Q. And, Doctor, I've written "AMS" to
22 at the bottom. Would you publish that to the jury
23 please?

24 A. Yes, but that's not what I'm saying.

1 Q. And in fact, Doctor, on the bottom
2 of figure 6, and if the camera would zoom in
3 please, you write "AMS mesh explants." Don't you,
4 sir? That's what you write, correct?

5 A. Yes, one of them is AMS.

6 Q. And they can't be the same mesh from
7 one from AM and one from Ethicon can it, sir?

8 A. Well they are.

9 Q. Is that a mistake, Doctor?

10 A. Which mistake? There might be "s"
11 as a plural tense -- sorry, as a plural form is an
12 error, a typo.

13 Q. Which is a typo?

14 A. The "explants".

15 Q. But, Doctor, you'll agree that the
16 AMS mesh picture that you circled is identical to
17 your AM -- to your report in the Edward's case,
18 correct?

19 A. Well, we clearly see that it's not
20 AMS it's Ethicon case. It's Ethicon case, yes.

21 Q. But you labelled it as an AMS
22 explant, correct?

23 A. Well, I included two pictures here
24 and it was probably a typo that "explants", one of

1 them is clearly Ethicon. And that does not
2 identify which patient. These are representative
3 images to show thrombosis rather than to attribute
4 specific findings to specific patient so there is
5 a big difference. Demonstrative purpose or
6 specific diagnostic purpose.

7 Q. And, Doctor -- but, Doctor, let's
8 look on page 18. And I want you to show the jury
9 the two samples that you're looking at. Show the
10 jury.

11 MR. ANDERSON: How many times do you
12 want him to show the jury?

13 MR. HUTCHINSON: I know you're upset.

14 MR. ANDERSON: Nobody's upset. You
15 think you've got your big gotcha moment. It
16 doesn't mean nothing to me.

17 BY MR. HUTCHINSON:

18 Q. Dr. Iakovlev, that's the same tissue
19 sample isn't it, sir?

20 MR. FREESE: Move to strike your sidebar
21 comment. Nobody is upset. You have three people
22 laughing over on this side of the table.

23 MR. HUTCHINSON: Are you finished?

24 THE DEPONENT: What do you mean?

1 MR. FREESE: I might be. I don't know
2 yet.

3 BY MR. HUTCHINSON:

4 Q. Dr. Iakovlev, page 18.

5 A. Yes.

6 Q. The picture on the top left and the
7 picture on the bottom left, that's the same tissue
8 sample isn't it, sir?

9 A. I don't know.

10 Q. It has the same smudge on it in the
11 middle doesn't it, sir?

12 A. You cannot go by smudge. You have
13 to go by labels and I would have to see original
14 slides to determine that.

15 Q. Doctor, you also gave opinions
16 against Ethicon in the Bellew case didn't you,
17 sir?

18 A. Yes, I did.

19 Q. I want to hand you what we'll mark
20 as Exhibit 11 in the Bellew case.

21 ---DEFENSE EXHIBIT NO. 11: Rule 26
22 expert report of Vladimir Iakovlev, re.
23 Diane Bellew.

24

1 BY MR. HUTCHINSON:

2 Q. In fact, Doctor, if you look at page
3 15 you say at the top "All images are of explanted
4 Ethicon mesh unless indicated otherwise." Do you
5 see that?

6 A. Yes, I do.

7 Q. And, Doctor, if we turn to page 33
8 of your report against Ethicon in the Bellew case,
9 show the jury the picture in the top.

10 A. Yes. So we know it's from Edward's
11 case.

12 Q. And, Doctor, that's the exact same
13 picture that you used in your report against AMS,
14 isn't it?

15 A. Yes, to demonstrate thrombosis.

16 Q. And in fact in your AMS report
17 that's the exact same picture that you labelled as
18 an AMS mesh explant, correct?

19 A. Well, I don't know if --

20 MR. ANDERSON: Object to the form of the
21 question.

22 THE DEPONENT: I don't know if it was
23 labelled for both or just for the top. I cannot
24 remember now what happened in 2014.

1 BY MR. HUTCHINSON:

2 Q. Doctor, let's look at Ms. Ramirez's
3 report. It's maybe Exhibit 1.

4 A. Okay. Here it is.

5 Q. Doctor, you signed and dated
6 Ms. Ramirez's report, didn't you?

7 A. Yes, I did.

8 Q. And let's look at page 20.

9 A. Page 20 of case specific or page 20
10 --

11 Q. Of case specific, yes, sir. Or I'm
12 sorry, general.

13 A. Yes.

14 Q. And you write, "All photographs are
15 of explanted Ethicon mesh."

16 MR. FREESE: Wait.

17 MR. ANDERSON: Your numbers on this
18 exhibit that you gave me are different. The page
19 numbers are different.

20 THE DEPONENT: It's the general.

21 MR. ANDERSON: Oh it's the general.
22 Okay.

23 BY MR. HUTCHINSON:

24 Q. Dr. Iakovlev, on page 20 of your

1 Ramirez report for Jennifer Ramirez you write,
2 "All photographs are of explanted Ethicon
3 devices." Correct?

4 A. That's correct.

5 Q. And, Doctor, if you look at page 32
6 of your report, turn there with me please.

7 A. Yes.

8 Q. Show that to the jury.

9 A. Yes, it's the same pictures we saw
10 before.

11 Q. That's the exact same picture that
12 you included in your report against AMS, is that
13 correct?

14 A. One of them.

15 Q. And, Doctor, that's the exact
16 picture that you included in your AMS report that
17 you labelled an AMS mesh, correct?

18 A. Well, we agreed that there are two
19 images and one is labelled as AMS, at least one,
20 and the other one, as we agreed, is Ethicon from
21 Ms. Edward's case.

22 Q. That was just a mistake wasn't it,
23 Doctor?

24 MR. ANDERSON: Objection.

1 THE DEPONENT: Again, could be typo.

2 BY MR. HUTCHINSON:

3 Q. Doctor, you also have given
4 testimony for the plaintiffs against Boston
5 Scientific haven't you?

6 MR. ANDERSON: Objection, asked and
7 answered.

8 THE DEPONENT: Yes, I did.

9 BY MR. HUTCHINSON:

10 Q. I want to hand you what we'll mark
11 as the next exhibit. Defense Exhibit 12.

12 ---DEFENSE EXHIBIT NO. 12: Rule 26
13 expert report of Dr. Vladimir Iakovlev
14 re. Amal Eghnayem.

15 BY MR. HUTCHINSON:

16 Q. Are you there with me?

17 A. Yes.

18 Q. And, Doctor, this is the report that
19 you did for the Eghnayem case, is that right?

20 A. That's correct.

21 Q. And you signed and dated this report
22 didn't you, sir?

23 A. Yes, I did.

24 Q. And, Doctor, if you look at page 16

1 of the report.

2 A. Yes.

3 Q. Your write, "All images are of
4 explanted Boston Scientific mesh unless indicated
5 others." Did I read that correctly, sir?

6 A. Yes, you did.

7 Q. And if you go to page 36 of your
8 Boston Scientific report.

9 A. 36?

10 Q. Yes, sir.

11 A. Yes.

12 Q. And using that black pen would you
13 circle the bottom image for us please?

14 A. This one?

15 Q. And, Doctor, why don't you write
16 "Boston Scientific" at the bottom?

17 MR. FREESE: No, we're not going to
18 write anything.

19 THE DEPONENT: I'm not writing anything.
20 I circled it but I'm not writing.

21 BY MR. HUTCHINSON:

22 Q. Doctor, would you hand me the
23 document please? You're refusing to write "Boston
24 Scientific" at the bottom, is that correct?

1 MR. ANDERSON: You can't ask him to
2 alter the exhibits. If you want to do it you can.

3 BY MR. HUTCHINSON:

4 Q. Doctor, are you refusing to write
5 Boston Scientific --

6 MR. ANDERSON: Don't answer the
7 question. Don't answer the question.

8 MR. FREESE: He's refusing to do it.

9 BY MR. ANDERSON:

10 Q. Doctor, you refuse to write "Boston
11 Scientific" at the bottom didn't you, sir?

12 MR. FREESE: No, he was instructed not
13 to do it.

14 MR. HUTCHINSON: Well I'm going to get a
15 yes or no from him on that question.

16 MR. FREESE: I'm telling you he was
17 instructed not to do it. You're asking him to
18 modify irrelevant exhibits and we're not going to
19 go down that path.

20 BY MR. HUTCHINSON:

21 Q. Dr. Iakovlev, are you refusing to
22 answer the question based on counsel's advice?

23 MR. FREESE: There's no question
24 pending. You asked him to write something or

1 modify or alter an exhibit and we're refusing to
2 do that.

3 BY MR. HUTCHINSON:

4 Q. And, Dr. Iakovlev, are you following
5 the lawyers' instructions?

6 MR. ANDERSON: Oh my gosh.

7 THE DEPONENT: Yes.

8 BY MR. HUTCHINSON:

9 Q. Thank you. And, Doctor, I want you
10 to compare the picture in your Boston Scientific
11 report to the picture in Ms. Bellew's report,
12 which is Exhibit number 11 on page 40.

13 A. Yes.

14 Q. And why don't you show it to the
15 jury alongside the one that you did for Boston
16 Scientific?

17 A. Yes.

18 Q. Alongside the one that you did for
19 Boston Scientific.

20 A. Yeah, they're the same images.

21 Q. Yeah. And, Doctor, in your right
22 hand you have a report that you prepared for
23 Boston Scientific, correct?

24 A. Yes, but I use images from different

1 manufacturers.

2 Q. And, Doctor, in your right hand your
3 report you tell whoever is going to read it that
4 all images are of explanted Boston Scientific mesh
5 don't you, sir?

6 A. Well --

7 MR. ANDERSON: Objection to form and
8 relevance.

9 THE DEPONENT: -- apparently there was
10 missed information -- missed labelling here that
11 it's from Boston Scientific.

12 BY MR. HUTCHINSON:

13 Q. Thank you. And in fact, Doctor, if
14 you look in the documents in your right hand, I'm
15 sorry, your left hand, those are Ethicon meshes
16 aren't they, sir?

17 A. Well I'm not stating that this is
18 Boston Scientific or this is Ethicon. The only
19 thing that is missing one of the labels misses
20 that it's a different manufacturer, that's it.

21 Q. Doctor, let's look at what you write
22 on page 16 of the report in your left hand.

23 A. Well, I told you that --

24 MR. ANDERSON: Objection, asked and

1 answered.

2 THE DEPONENT: -- one of the reports is
3 missing that extra information. And it doesn't
4 matter because it does not state that this is
5 specific manufacturer, it just demonstrates
6 histological feature. Manufacturer doesn't
7 matter.

8 BY MR. HUTCHINSON:

9 Q. Dr. Iakovlev, in your report that
10 you have in your hand now, page 15, you write,
11 "All images are of explanted Ethicon mesh."
12 Correct?

13 A. That's correct. I tried to do as
14 precise as possible, but since the focus is not on
15 specific manufacturer but on the histological
16 feature maybe some labels were not expanded
17 appropriately.

18 Q. And, Doctor, let's look at some more
19 of those labels. Let's look in the Eghnayem
20 figure 23(B).

21 A. Now I'm lost which --

22 Q. Eghnayem, Exhibit number 12.

23 A. Yes.

24 Q. Figure 23(B). And I want you to

1 compare it to what you did in the Bellew case on
2 page 67.

3 MR. ANDERSON: Objection. Relevance and
4 form.

5 THE DEPONENT: 23(B). And you want me
6 to compare which one?

7 BY MR. HUTCHINSON:

8 Q. Figure 23(B) on page 51 of your
9 Eghnayem report --

10 A. With?

11 Q. -- with figure 25(C) on page 67 of
12 your Bellew report.

13 A. Figure -- sorry, page?

14 Q. That's okay, Doctor, let me do it
15 again. I want you to compare figure 23(B) of your
16 Boston Scientific report to figure 25(C) of your
17 Ethicon report on page 67.

18 A. Yes.

19 Q. Doctor, will you show the jury those
20 two images please?

21 A. So they're exactly the same images.

22 Q. And, Doctor, in fact the one on the
23 top is from Boston Scientific and the one you have
24 on the bottom is from Ethicon. Is that correct,

1 sir?

2 A. Well, I did not say that the sample
3 is from one and from the other.

4 Q. In fact, Doctor, you did write that
5 all images are of Ethicon -- are of Boston
6 Scientific unless otherwise indicated, correct?

7 MR. ANDERSON: Objection.

8 THE DEPONENT: That was my intent.

9 BY MR. HUTCHINSON:

10 Q. Thank you

11 A. But for some labels this information
12 didn't enter it was not entered.

13 Q. It was not what?

14 A. Entered.

15 Q. Entered?

16 A. Yes.

17 Q. Entered by whom?

18 A. By me.

19 Q. Alright. Doctor, let's look at the
20 next page. Page 52 of your Boston Scientific
21 report and compare it to page 68 of your Ethicon
22 report.

23 A. Yeah, it's the test same image.

24 Again, I'm not demonstrating a feature of a

1 specific manufacturer I'm demonstrating a
2 histological feature which is common for all
3 polypropylene meshes, doesn't matter which
4 manufacturer. Can be coming from AMS, from Boston
5 Scientific, from Ethicon. All of the meshes
6 degrade. They will all show the same features.

7 Q. Move to strike as nonresponsive.

8 Doctor, let's look at 28(A) in your
9 Boston Scientific report and compare it to 30(A)
10 in your Ethicon report. Those images are
11 identical aren't they?

12 A. Which ones again?

13 MR. ANDERSON: Objection.

14 BY MR. HUTCHINSON:

15 Q. 28(A) in your Boston Scientific
16 report and 30(A) in your Ethicon report.

17 MR. FREESE: Would you identify them
18 by --

19 MR. HUTCHINSON: Page number?

20 MR. FREESE: And the party name too
21 please.

22 BY MR. HUTCHINSON:

23 Q. Those images are identical aren't
24 they, sir?

1 MR. FREESE: Object. Until you identify
2 what reports in which cases and then we object to
3 the relevance.

4 BY MR. HUTCHINSON:

5 Q. And, Dr. Iakovlev, I'm referring to
6 your Boston Scientific report, page 58, and your
7 Ethicon report, page 74.

8 A. Yes.

9 Q. Those images are identical aren't
10 they, sir?

11 A. That's correct.

12 Q. And, Doctor, if we look at the
13 images on page 59 of your Boston Scientific report
14 to page 75 of your Ethicon report, those images
15 are identical aren't they, sir?

16 A. Yeah. I'm showing the same feature.
17 I'm using different manufacturers because it
18 doesn't matter, I'm showing features not
19 manufacturers.

20 Q. And, Doctor, if we look at page 60
21 of your Boston Scientific report and compare that
22 to page 76 of your Ethicon report, those images
23 are identical aren't they, sir?

24 A. Yes, they are.

1 Q. And, Doctor, if we look at page 61
2 of your Boston Scientific report and compare it to
3 page 77 of your Ethicon report those images are
4 identical aren't they, sir?

5 A. All transmission electron images are
6 identical because I examined only five or six
7 specimens only. Only I think one or two were
8 Ethicon and others were from other manufacturers.

9 Q. Move to strike as nonresponsive.
10 My question, sir, is that those images
11 are identical aren't they?

12 A. Yes. They show -- as I said, I did
13 very little transmission electron microscopy work.
14 There were just few specimens. They are the same.

15 Q. And, Doctor, let's look at page 62
16 of your Boston Scientific report and compare it to
17 page 78 of your Ethicon report.

18 A. Yes.

19 Q. 62 of the Boston Scientific report
20 and compare that to page 78 of your Ethicon
21 report?

22 A. Yes.

23 Q. Those images are identical aren't
24 they, sir?

1 MR. ANDERSON: Objection.

2 THE DEPONENT: As I said, all
3 transmission electron microscopy images are
4 identical. I had very limited amount of
5 photographs for transmission electron microscopy.
6 They are all copied from all the same reports.

7 BY MR. HUTCHINSON:

8 Q. In fact, Doctor, if we look at page
9 63 of your Boston Scientific report and compare
10 that to page 79 of your Ethicon report those
11 images are identical aren't they, sir?

12 A. Well I just told you, all
13 transmission electron microscopy images are
14 identical for either manufacturer. Because,
15 again, it doesn't matter what manufacturer I'm
16 showing the features of degradation.

17 Q. Doctor, those pictures that you're
18 showing us they can't be of both a Boston
19 Scientific and an Ethicon mesh at the same time
20 can they?

21 MR. ANDERSON: Objection.

22 THE DEPONENT: No, of course not.

23 BY MR. HUTCHINSON:

24 Q. Thank you.

1 A. But the feature is the same.

2 Q. And, Doctor, you've given testimony
3 in the White case haven't you, sir?

4 A. Yes.

5 Q. And I want to hand you what we'll
6 mark as Exhibit 13 to your deposition.

7 ---DEFENSE EXHIBIT NO. 13: Report by
8 Dr. Iakovlev titled
9 "Clinico-pathological Correlation of
10 Complications Experienced by Ms.
11 Virginia White".

12 BY MR. HUTCHINSON:

13 Q. This is your expert report that was
14 signed and dated by you, is that correct?

15 A. That's correct.

16 Q. And, Doctor, on page 2 at the top
17 you write in your report, "Ethicon TVT sling was
18 placed for incontinence." Did I read that
19 correctly?

20 MR. ANDERSON: Objection.

21 MR. FREESE: Hold on. Let's identify --
22 you said the White case. White versus who?

23 MR. HUTCHINSON: White versus Ethicon.

24

1 BY MR. HUTCHINSON:

2 Q. Dr. Iakovlev, you write on page 2,
3 "Ethicon TVT sling was placed for incontinence."
4 Correct?

5 MR. ANDERSON: Objection to the entire
6 line of questions. It has nothing to do with
7 Ramirez but object to that specific question as
8 well.

9 BY MR. HUTCHINSON:

10 Q. Dr. Iakovlev?

11 A. Yes, I do see it.

12 Q. And that's what you wrote, correct?

13 A. That's correct.

14 Q. And you're telling everybody --

15 A. Well it's not just wrote, this is a
16 clinical summary. I was copying it from medical
17 records.

18 Q. Okay. And, Doctor, Ethicon is the
19 only company that makes a TVT sling aren't they?

20 A. People use that term flexibly. So
21 clinician just frequently say "TVT" for any sling.

22 Q. Move to strike as nonresponsive.

23 MR. ANDERSON: May not like the answer
24 but --

1 BY MR. HUTCHINSON:

2 Q. Dr. Iakovlev, Ethicon is the only
3 company that makes a brand name TVT sling,
4 correct?

5 A. Brand name TVT sling, yes, but the
6 term is uses loosely by clinicians.

7 Q. Okay. And, Doctor, you gave
8 testimony under oath that Ms. White received a TVT
9 sling didn't you, sir?

10 A. Well I copied it from the records.

11 Q. And, Doctor, did you ever look at
12 the medical records to make sure that they were
13 accurate?

14 A. What do you mean? I'm copying it
15 from the records.

16 Q. Doctor, I want to hand you what
17 we'll mark as Exhibit 14 to your deposition.

18 ---DEFENSE EXHIBIT NO. 14: Medical
19 report from Mercy Hospital Northwest
20 Arkansas re. Virginia White. Bates
21 labelled WHITEV_SMAMM_MDR00027.

22 BY MR. HUTCHINSON:

23 Q. This is the medical record for
24 Ms. White. And if you show the jury please in the

1 middle of the document where we're looking at
2 under the word "Implants". Would you show the
3 jury that for us please?

4 A. I have to see where it is.

5 Q. Right in the middle.

6 A. Yes, I see it.

7 Q. Okay. And, Doctor, the medical
8 record for Ms. White says, "Inventory: Sling
9 transvaginal advent fit. Implant name:
10 Advantage. Manufacturer: Boston Scientific
11 Corporation." Did I read that correctly?

12 A. Just let me examine the entire
13 document.

14 MR. FREESE: Object to the question.
15 You don't have the medical records so you selected
16 one.

17 BY MR. HUTCHINSON:

18 Q. Your objection is noted.

19 MR. ANDERSON: Of course it's noted,
20 she's typing it down. I would hope so.

21 MR. HUTCHINSON: Your comment is noted
22 too.

23 MR. ANDERSON: I would hope so. She's
24 typing it.

1 BY MR. HUTCHINSON:

2 Q. Dr. Iakovlev, my question to you is,
3 this medical record for the White case that you
4 gave opinions against Ethicon it says,
5 "Manufacturer: Boston Scientific". Correct?

6 A. Yes, I copied it from the records.

7 Q. And, Doctor, would you show that to
8 the jury please? And right in the middle is where
9 it says, "Manufacturer: Boston Scientific." Is
10 that right?

11 A. Yeah, this specific document says
12 Boston Scientific.

13 Q. And, Doctor, you gave testimony
14 under oath that Ms. White received a product other
15 than Boston Scientific didn't you, sir?

16 MR. FREESE: Well she did according to
17 the medical record. Why are you ignoring the top
18 of the exhibit?

19 BY MR. HUTCHINSON:

20 Q. Dr. Iakovlev, you testified under
21 oath that Ms. White received a TVT sling didn't
22 you, sir?

23 A. Yes, I did.

24 Q. And, Doctor, according to the

1 medical record for Ms. White she received a
2 product manufactured by Boston Scientific didn't
3 she, sir?

4 MR. FREESE: Object to the question,
5 misstates the record. Are you just going to
6 ignore what's right above it?

7 THE DEPONENT: No, I can see one is a
8 Boston Scientific product, the other is an Ethicon
9 product.

10 BY MR. HUTCHINSON:

11 Q. In fact, Doctor, the Gynemesh that's
12 not a sling used to treat incontinence is it, sir?

13 MR. ANDERSON: Objection.

14 THE DEPONENT: Well let me just read the
15 whole thing again.

16 MR. FREESE: Can we have a standing
17 objection on anything that is White -- all the
18 stuff that's non-Ramirez specific we don't have
19 complete records. We don't --

20 MR. HUTCHINSON: You have a standing
21 objection, counsel.

22 MR. FREESE: Thank you.

23 MR. HUTCHINSON: You're welcome.

24

1 BY MR. HUTCHINSON:

2 Q. Dr. Iakovlev, are you still
3 reviewing that one page medical record?

4 MR. FREESE: Objection, argumentative.

5 THE DEPONENT: Well, I review
6 everything.

7 BY MR. HUTCHINSON:

8 Q. Dr. Iakovlev, are you still
9 reviewing that one page medical record?

10 MR. ANDERSON: Objection. Ask your
11 question.

12 BY MR. HUTCHINSON:

13 Q. That's my question, are you still
14 reviewing that one-page medical record?

15 MR. ANDERSON: He said he's ready.

16 THE DEPONENT: I'm ready.

17 BY MR. HUTCHINSON:

18 Q. Dr. Iakovlev, you testified under
19 oath about the wrong product that Ms. White
20 received didn't you, sir.

21 MR. ANDERSON: Objection. Where's the
22 testimony?

23 BY MR. HUTCHINSON:

24 Q. You can answer.

1 A. Well, I'm copying here from the
2 records in the summary. It's not my testimony,
3 it's not my opinion. That's something I copied
4 from the records.

5 Q. Doctor, you gave opinions in the
6 White case about a TVT sling, correct?

7 A. That's -- well, I have to read the
8 whole. I don't remember the whole case. Trying
9 -- you're plucking one specific fact. I have to
10 review the whole report.

11 MR. FREESE: Well more importantly
12 you're referring to testimony, Chad, and you're
13 refusing to show the witness the testimony you say
14 he gave.

15 BY MR. HUTCHINSON:

16 Q. Well, let's look at page --

17 MR. FREESE: And you hand him one page
18 of Ms. White's medical records.

19 BY MR. HUTCHINSON:

20 Q. I'll tell you what, Doctor, I'll
21 make it easy for you. Let's look at the first
22 sentence --

23 MR. ANDERSON: Object to the form of the
24 question.

1 BY MR. HUTCHINSON:

2 Q. Doctor, let's look at page -- it's
3 actually page 6. We're under the
4 clinico-pathological correlation. Are you there
5 with me, Dr. Iakovlev?

6 A. You would have to give me time so I
7 review the document and then I can answer your
8 questions.

9 Alright. So --

10 Q. Dr. Iakovlev, I'm sorry I don't have
11 a question pending. I'm not interrupting him but
12 I don't have a question pending.

13 MR. FREESE: That's fine.

14 MR. HUTCHINSON: Well, you're looking at
15 me that way and I was going to say --

16 MR. FREESE: No, I wasn't saying
17 anything. I was looking because I didn't think
18 there was a question pending.

19 BY MR. HUTCHINSON:

20 Q. Dr. Iakovlev, turn with me to page 6
21 under "Clinico-pathological correlation". Are you
22 there? Dr. Iakovlev, are you there?

23 A. Yes, I am.

24 Q. And you write, first sentence:

1 "As described in the clinical
2 records Ms. White had rectocele repair
3 with Gynemesh and TVT retropubic
4 suburethral sling placement for mixed
5 incontinence."

6 Did I read that correctly?

7 A. That's correct.

8 Q. And, Doctor, this report that you
9 have in front of you for the White case is a
10 report that contains opinions about Ethicon,
11 correct?

12 A. That's correct.

13 Q. And, Doctor, if you look at the
14 medical record that we've marked as Exhibit 13 --
15 14 to your deposition?

16 A. Yes.

17 Q. You will agree that in the middle it
18 says, "Manufacturer, Boston Scientific" when it
19 discusses the sling?

20 A. This is not correct. It says
21 "Gynecare Gynemesh". What I received from
22 Ms. White is posterior mesh which was Gynemesh.
23 And I gave opinions regarding Gynemesh
24 manufactured by Ethicon because I received only

1 Ethicon product.

2 Q. And, Doctor, if you would -- for the
3 benefit of the jury I'm going to ask that you show
4 the jury that --

5 MR. ANDERSON: No, if you want to show
6 the jury for something you need to bring your
7 trial consultant or you bring your own thing.
8 You're going to stop making him walk around and
9 parade this thing like a sandwich boy. Now, if
10 you want to show him something you show it to him.
11 He's not showing you anything else.

12 MR. HUTCHINSON: He's got Exhibit 14 in
13 front of him, counsel.

14 MR. ANDERSON: Well, he'll hand it back
15 to you. Here you go. Show whatever you want.

16 MR. HUTCHINSON: No.

17 BY MR. HUTCHINSON:

18 Q. Dr. Iakovlev, here is Exhibit 14.

19 MR. ANDERSON: He's not going to be a
20 poster boy no more. Don't do it.

21 BY MR. HUTCHINSON:

22 Q. Dr. Iakovlev, would you take Exhibit
23 14 and show the jury where it says the sling that
24 Ms. White received was a TVT sling?

1 A. I'm not stating that I received a
2 TVT sling in my White report. I received a
3 posterior Gynemesh and I gave my opinions
4 regarding Gynemesh.

5 Q. And you also gave opinions regarding
6 the TVT sling for Ms. White didn't you, sir? In
7 fact on page 9 under "Urinary Symptoms" you write:

8 "Clinical records indicated
9 worsening of urge incontinence and
10 appearance of urinary obstruction
11 approximately six weeks after the
12 placement of TVT sling."

13 Did I read that correctly?

14 MR. FREESE: That's now the second
15 question. You asked a question, then he didn't
16 answer it and you've asked a second question now.
17 Which one do you want him to answer?

18 BY MR. HUTCHINSON:

19 Q. Dr. Iakovlev, you also gave opinions
20 regarding the TVT sling for Ms. White didn't you,
21 sir?

22 A. Yes. Regarding urinary symptoms I
23 gave opinions. Again --

24 Q. And in fact, Doctor, you gave

1 opinions in the White case that TVT was defective,
2 correct?

3 MR. ANDERSON: Objection.

4 THE DEPONENT: Well, I didn't use
5 defective, the word "defective" but it caused
6 symptoms.

7 BY MR. HUTCHINSON:

8 Q. And, Doctor, it was your opinion in
9 the White case that the TVT product degrade, is
10 that correct?

11 A. I don't see any mentioning of TVT
12 regarding degradation. Let me read the whole
13 paragraph.

14 Q. Doctor, it's on the last page. "It
15 is my opinion that polypropylene of the mesh
16 device degraded while in the body of Ms. White."
17 Did I read that correctly?

18 A. Well it doesn't say "TVT" anywhere.

19 Q. Dr. Iakovlev, did I read that
20 correctly?

21 A. Yes, you did.

22 Q. Thank you.

23 A. You didn't read TVT anywhere.

24 Q. And in fact, Doctor, you write on

1 page 9 of your report for Ms. White that she did
2 receive a TVT sling didn't you, sir?

3 A. Well, that's what I copied from the
4 records.

5 Q. And, Doctor, according to the
6 implant record Ms. White didn't receive a TVT
7 sling did she, sir?

8 MR. FREESE: Object to the form of the
9 question. Unless you're going to state on the
10 record and stipulate that there's no other medical
11 record in Ms. White's file that describes a TVT
12 sling -- you've taken one page out of someone's
13 file and are attempting to, I suppose, represent
14 that that is the only record of the description of
15 the sling. I mean, it's totally improper. I know
16 you've given me a standing objection on it. I
17 think we're wasting time. I don't know how you
18 can ever lay a foundation on this.

19 MR. HUTCHINSON: Counsel, this has a
20 serial number for the implant. Your objection is
21 noted. Just make your objection, we'll move on.

22 BY MR. HUTCHINSON:

23 Q. Dr. Iakovlev, on Exhibit 14 this
24 lists the two implants that Ms. White received by

1 serial number, correct?

2 A. That's correct.

3 Q. And, Dr. Iakovlev, did Ms. White
4 received a TVT product with a specific serial
5 number, yes or no?

6 A. Well all of them have specific
7 numbers.

8 Q. Move to strike as nonresponsive.

9 MR. ANDERSON: He answered your
10 question.

11 BY MR. HUTCHINSON:

12 Q. My question, sir, did Ms. White
13 receive a TVT product with an Ethicon serial
14 number, yes or no?

15 A. I cannot tell you. I wasn't
16 handling the product. I was not inserting them.

17 Q. Doctor, if you look at page 14?

18 A. But it's one page and --

19 Q. I understand that, but my question
20 is if you look at Exhibit 14 can you tell us, do
21 you have Exhibit 14 in front of you, sir?

22 A. Yes, it's in front of me.

23 Q. Is it far enough away where you can
24 read it?

1 A. Well I know what it says.

2 Q. Doctor, according to Exhibit 14 did
3 Ms. White receive a TVT product with an Ethicon
4 serial number, yes or no?

5 A. On that page there is no mentioning
6 of TV -- Ethicon TVT brand name.

7 Q. Thank you. Doctor, I want to hand
8 you what's been marked as Exhibit 15 to you
9 deposition.

10 ---DEFENSE EXHIBIT NO. 15: Expert
11 report of Dr. Iakovlev In Re. Ethicon,
12 Inc., Pelvic Repair System Products
13 Liability Litigation relating to all
14 Wave 1 Cases.

15 BY MR. HUTCHINSON:

16 Q. In fact this is a report that you
17 prepared against Ethicon as early as January of
18 this year, is that correct?

19 A. That's correct.

20 Q. And this is a report that's signed
21 and dated by you. Is that correct, sir?

22 A. That's correct.

23 Q. And if we look at page 60 of your
24 report.

1 A. Yes.

2 Q. You have a figure set 8(E) at the
3 bottom, do you see that?

4 A. I do.

5 Q. And I'm going to ask, Doctor, if
6 you'll you use your black pen to circle that
7 photograph, or those two photographs at the bottom
8 please on page 60 of your Wave 1 report.

9 A. So which ones?

10 Q. The two photographs at the bottom on
11 page 60 of your Wave 1 report. And, Doctor, you
12 labelled those photographs as "bladder muscles",
13 correct?

14 A. Well, let's --

15 Q. Well --

16 A. You're stopping me. The photographs
17 relate to specific portion of the report which is
18 on a different page.

19 Q. And, Doctor, my question to you is,
20 for the photographs that you've circled on page 60
21 you write at the bottom, "Involvement of the
22 detrusor (bladder) muscle by the mesh, smooth
23 muscle." Did I read that correctly, sir?

24 A. Yes. You read it correctly but you

1 omitted that these all photographs they belong to
2 a specific section of the report, and that section
3 is in front and I can guide you to that.

4 Q. Well one of my questions, Doctor, is
5 that is of the bladder muscle isn't it?

6 A. The top photograph? Yes, it is
7 bladder muscle.

8 Q. What about the bottom photograph?

9 A. All these photographs they combine
10 both bladder and the rectum. And the section in
11 the front clearly describes either bladder or
12 rectum.

13 Q. And, Doctor, on the photographs on
14 the bottom of page 60 you don't describe these as
15 rectum muscles do you?

16 A. I describe them on a different page
17 of this report.

18 Q. Move to strike as nonresponsive.

19 MR. ANDERSON: You may not like his
20 answer but it's a responsive answer.

21 BY MR. HUTCHINSON:

22 Q. My question, Doctor, is that on page
23 60 you don't describe these muscles as rectal
24 muscles do you, sir?

1 A. I describe them on a different page
2 of this report.

3 Q. In fact, Doctor, if we look at page
4 61 of that report, the very next page, you talk
5 about -- or you show two pictures and label those
6 bladder muscles too, don't you?

7 A. Again, all these pictures they
8 represent either bladder or the rectum. And it
9 clearly -- it is clearly described in the report
10 in appropriate section of this report.

11 Q. Where does it say "rectum" on these
12 pictures that you have in front of you on page 60
13 and 61?

14 A. I keep telling you it's in a
15 different page of the report.

16 Q. Doctor, this photograph on -- strike
17 that.

18 Doctor, looking on page 60 of the
19 photograph you've circled?

20 A. Yes.

21 Q. Would you show those to the jury
22 please?

23 MR. ANDERSON: No. You can show them to
24 the jury if you want to. Here you go.

1 MR. HUTCHINSON: Counsel, we're going to
2 be here all day long but I'm not going to stand in
3 front of the jury and show them the pictures.

4 MR. ANDERSON: You're not going to make
5 him do it. You bring them to trial and do it
6 yourself then.

7 BY MR. HUTCHINSON:

8 Q. Dr. Iakovlev, I've handed you what
9 is Exhibit 15. Would you take it please?

10 A. Yes.

11 Q. Dr. Iakovlev, my question is this,
12 will you agree to show the jury the photographs on
13 page 16?

14 MR. ANDERSON: No, you can put your
15 camera on it. He's not going to do this any more.

16 MR. FREESE: Why are we arguing about
17 this? Chad, just hold it up yourself. The
18 camera's right next to you. Nobody's objecting if
19 you want to hold it up.

20 MR. HUTCHINSON: I'm entitled to an
21 answer from the witness.

22 MR. ANDERSON: No, you're not. You
23 cannot bypass the lawyers to get to the witness.
24 If we tell him he's not doing it he's not doing

1 it.

2 MR. HUTCHINSON: I am going to get an
3 answer to the question and the witness may not
4 want to do it and that's fine.

5 MR. FREESE: Hold on a sec. You're not
6 asking a question he's refusing to answer, you're
7 asking him to do physical -- become a
8 demonstrative aid for you. That's not his
9 function here. He's here to answer questions
10 about his opinions. If you want the jury to see
11 something you are perfectly welcome to hold it up
12 in front of the camera and show it to them.

13 MR. ANDERSON: You're not going to
14 disrespect this expert by having him sit there
15 holding up your stuff and then yelling at him.
16 Not going to have it. We're done with it.

17 BY MR. HUTCHINSON:

18 Q. Doctor, you've held up a lot of
19 exhibits for the plaintiff lawyers haven't you,
20 sir?

21 MR. ANDERSON: We've done that. We're
22 not doing it any more.

23 MR. HUTCHINSON: No, I'm asking him --

24 MR. ANDERSON: No, no --

1 MR. HUTCHINSON: I'm getting an answer
2 to the question.

3 BY MR. HUTCHINSON:

4 Q. Dr. Iakovlev, you've held up
5 exhibits for the plaintiff lawyers haven't you.

6 MR. FREESE: A piece of wood, the same
7 piece of wood you asked him to hold.

8 THE DEPONENT: I think I was holding
9 only piece of wood, nothing else.

10 BY MR. HUTCHINSON:

11 Q. And, Doctor --

12 MR. ANDERSON: Why don't you just ask
13 him a question and move on with the deposition.

14 BY MR. HUTCHINSON:

15 Q. -- would you agree to show the jury
16 the photographs on page 60?

17 MR. FREESE: No, he won't. You can show
18 the jury the photographs if you like.

19 BY MR. HUTCHINSON:

20 Q. Would you agree to do that?

21 MR. FREESE: No. I'm instructing him
22 not to do it. This is not even about the Ramirez
23 case. If you think it's relevant to something you
24 want to prove in Ramirez then you hold it up.

1 He's here to answer questions about his opinion in
2 Ramirez. We don't need to go through these
3 gymnastics, Chad. If you want the jury to see the
4 picture hold it up. Hire an IT guy to put it up
5 on the screen.

6 MR. ANDERSON: I think J&J can probably
7 afford it, huh? We let you use our guy. Why
8 didn't you bring something to show through there?
9 We're not going to do your work for you. Are you
10 going to ask the question or not?

11 MR. FREESE: Really, we're just wasting
12 time. Let's not argue about it. If you want to
13 hold something up hold it up but he's not your
14 demonstrative aid.

15 MR. HUTCHINSON: My question is which
16 one of you all are defending this deposition?

17 MR. FREESE: Both of us are.

18 MR. ANDERSON: Are you going to ask your
19 questions or not? This is ridiculous.

20 BY MR. HUTCHINSON:

21 Q. Dr. Iakovlev, on page 60 of your
22 report, are any of the photographs you show on
23 page 60 of your report labelled as rectal muscles?
24 Yes or no?

1 A. As I said, the description of these
2 pictures is on a different page of this report.

3 Q. We'll take a quick break.

4 THE VIDEOGRAPHER: Going off the record
5 at 5:17 p.m.

6 --- Break taken.

7 THE VIDEOGRAPHER: Back on the record at
8 5:29 p.m.

9 BY MR. HUTCHINSON:

10 Q. Dr. Iakovlev, no further questions.

11 A. Thank you.

12 RE-DIRECT EXAMINATION BY MR. ANDERSON:

13 Q. Good afternoon, Dr. Iakovlev. The
14 attorney for the defendants asked you if you have
15 been retained as an expert consultant in cases
16 against the mesh manufacturers AMS, Bard, Boston
17 Scientific and Ethicon. Do you remember that?

18 A. Yes, I do.

19 Q. And for those cases that you've
20 reviewed estimate how many pages of medical
21 records of the patients that you have reviewed in
22 all those cases?

23 A. Thousands.

24 Q. Okay. And are -- is your review and

1 your expert consulting work of those related to
2 women who have been injured by mesh?

3 MR. HUTCHINSON: Objection to form,
4 foundation.

5 THE DEPONENT: Yes.

6 BY MR. ANDERSON:

7 Q. And are you asked to relate your
8 pathological findings to complications that women
9 who've been injured by AMS products, Bard
10 products, Boston Scientific, Ethicon products, is
11 that correct?

12 MR. HUTCHINSON: Objection, foundation.

13 THE DEPONENT: That's correct.

14 BY MR. ANDERSON:

15 Q. And are these related to cases that
16 are pending all across the United States?

17 A. Yes, that's correct.

18 Q. And is this all involving
19 transvaginal polypropylene meshes?

20 A. Yes.

21 Q. Like the TVT-O?

22 A. Like the TVT-O.

23 Q. And are all the meshes that you've
24 looked at still on the market?

1 A. No, some of them were so bad that --

2 MR. HUTCHINSON: Objection, irrelevant.

3 THE DEPONENT: -- they discontinued

4 their production.

5 MR. HUTCHINSON: Objection, relevancy.

6 BY MR. ANDERSON:

7 Q. Is your work in those cases

8 something that has formed, in addition to your

9 background, training, and experience, formed the

10 basis for you to be able to do your work in the

11 scientific literature?

12 A. Yes.

13 Q. And with regard to your publications

14 in the scientific literature regarding

15 transvaginal meshes, do you include images from

16 all different manufacturers in those scientific

17 studies?

18 A. Yes, I do. When I show a

19 histological feature I include all manufacturers.

20 I mean, the features are the same across these

21 manufacturers.

22 Q. From a pathological standpoint?

23 A. From a pathological standpoint.

24 Q. And in your review of all the

1 literature in this case that we discussed quite a
2 bit in your direct examination, have you seen
3 where other scientists, including pathologists,
4 have included features of mesh from different
5 manufactures in their scientific work?

6 A. That's correct. Sometimes they
7 don't even know who the manufacturer is. And
8 polypropylene mesh they describe the mesh but
9 manufacturer isn't known.

10 Q. Do you find that uncommon or
11 inappropriate to include features of different
12 mesh manufacturers in a body of mesh research in
13 order to try to relate pathological findings to
14 clinical complications?

15 MR. HUTCHINSON: Objection foundation.
16 Counsel, you're talking about mesh from other
17 manufacturers that he used?

18 MR. FREESE: Yeah, something like you
19 did in the last hour.

20 MR. ANDERSON: Yeah, something like
21 that.

22 BY MR. ANDERSON:

23 Q. Go ahead and answer it please.

24 A. Yes. I think it is appropriate just

1 to see the range of changes and see if there is
2 any change, any difference. In fact most of the
3 time I cannot even tell what is manufacturer.
4 Looking at the histological slides they all look
5 the same. The only difference is some of them
6 have blue fibres and some of them have only clear
7 fibers.

8 Q. Counsel was asking you questions
9 about the testimony against these mesh
10 manufacturers, approximately how many women does
11 that represent that you have -- that have made
12 claims for injuries regarding mesh that you have
13 performed expert consulting work for?

14 MR. HUTCHINSON: Objection, foundation.

15 BY MR. ANDERSON:

16 Q. How many are we talking about,
17 doctor?

18 A. Thousands.

19 MR. HUTCHINSON: Same objection,
20 foundation.

21 THE DEPONENT: Tens of thousands of
22 women were injured. And as I said, some of the
23 devices have been taken off the market because of
24 high complication rate.

1 MR. HUTCHINSON: Move to strike as
2 nonresponsive.

3 BY MR. ANDERSON:

4 Q. When you have prepared reports in
5 these cases where women have been injured by
6 various mesh manufacturers have you prepared
7 general reports as well as case-specific reports?

8 MR. HUTCHINSON: Objection, relevance.

9 THE DEPONENT: Yes, I did.

10 BY MR. ANDERSON:

11 Q. And in the general portion of those
12 reports are those the one that counsel went to
13 great lengths to show you one after another after
14 another at the end of your cross-examination?

15 A. Yes.

16 Q. And in those general reports, like
17 your scientific literature, do you include futures
18 from all different mesh manufacturers that you see
19 in pathological findings?

20 A. Yes, always.

21 Q. And do you find anything
22 inappropriate or uncommon about showing
23 pathological changes across all different types of
24 mesh manufacturers in your general reports that

1 you prepared in this litigation?

2 MR. HUTCHINSON: Objection, foundation.

3 THE DEPONENT: No, it's not

4 inappropriate. Sometimes it's even my purpose
5 just to show the similarities, how similar they
6 are under the microscope.

7 BY MR. ANDERSON:

8 Q. So for all those reports he kept
9 showing you one after another and showing this
10 image versus that image, was it your intent to
11 present pathological findings across the mesh
12 manufacturers?

13 MR. HUTCHINSON: Objection, foundation.

14 THE DEPONENT: Yes, it was. My intent
15 was to show features and they were similar between
16 manufacturers because the designs are similar.

17 BY MR. ANDERSON:

18 Q. Of the polypropylene meshes?

19 A. The polypropylene meshes and
20 transvaginal devices made out of polypropylene
21 meshes.

22 Q. One of the things counsel showed you
23 was -- I don't know, Exhibit 12 or something. But
24 he was showing you this bark implying that there

1 was something inappropriate about putting in
2 broken bark from one manufacturer to another. Do
3 you see that page?

4 MR. HUTCHINSON: Objection.

5 THE DEPONENT: Yes, I do.

6 MR. HUTCHINSON: Objection, form.

7 BY MR. ANDERSON:

8 Q. What's it say in the description of
9 that?

10 A. "Blue granules in a bark separated
11 from the core. Transvaginal mesh of another
12 manufacturer."

13 Q. Thank you. When you were shown the
14 information on the Virginia White case, do you
15 remember that?

16 A. Yes.

17 Q. Does Virginia White's case have
18 anything to do with Ms. Ramirez?

19 MR. HUTCHINSON: Counsel, I'm just going
20 to object to the extent that we've admitted that
21 exhibit for the limited purpose of attacking his
22 credibility, and that does not make the entire
23 Virginia White case relevant.

24 MR. FREESE: Well we'll see about that.

1 I mean my response to that, Chad, is, you know,
2 there's a reason the rules of evidence don't allow
3 for impeachment on collateral matters, because
4 then you get off into a mini-trial on something
5 else. You deliberately brought one page of a
6 medical record of a file that I'm certain has
7 hundreds of pages of medical records and then
8 tried to imply -- or not imply, basically said
9 that he mistranscribed that medical record into
10 his report. So you have put that into evidence.

11 MR. HUTCHINSON: Fair enough. But,
12 counsel, we're simply showing his sloppy
13 methodology. You know it's sloppy and we put it
14 in for the limited purpose of attacking his
15 credibility.

16 MR. ANDERSON: I take great exception --

17 MR. HUTCHINSON: So note my objection.

18 MR. ANDERSON: No, no, no. No. You
19 keep your personal attacks to yourself.

20 MR. HUTCHINSON: Hey --

21 MR. ANDERSON: You want to talk about
22 sloppy?

23 MR. HUTCHINSON: Don't raise your voice
24 at me.

1 MR. ANDERSON: I already have and I will
2 again.

3 MR. HUTCHINSON: Don't raise --

4 MR. ANDERSON: You do not talk about
5 sloppy about this gentleman, you understand?

6 MR. HUTCHINSON: Don't raise your voice
7 at me.

8 MR. ANDERSON: You will treat him with
9 respect.

10 MR. HUTCHINSON: I'm treating him with
11 respect.

12 MR. ANDERSON: You talk about sloppy,
13 talk about your client who's sloppy.

14 MR. HUTCHINSON: You treat everybody
15 else here with respect, counsel. Don't you raise
16 your voice at me.

17 MR. ANDERSON: I already have and I will
18 again if you keep talking about my witness like
19 that.

20 MR. HUTCHINSON: I'm not talking about
21 your witness.

22 MR. ANDERSON: How about your sloppy
23 manufacturer?

24 MR. HUTCHINSON: I'm not talking about

1 your witness.

2 MR. FREESE: Just object to the form and
3 let us ask -- you introduced this, Chad. We're
4 going to do a redirect on what you introduced and
5 you can object to the form of the question.

6 MR. HUTCHINSON: I've already lodged my
7 objection, counsel. Thank you.

8 BY MR. ANDERSON:

9 Q. Doctor, is Ms. White a different
10 plaintiff than Ms. Ramirez?

11 A. Yes, she is.

12 Q. Is her case pending in a different
13 court?

14 A. Yes, it is.

15 Q. How many page of Ms. White's --

16 MR. HUTCHINSON: Can we have a standing
17 objection to relevance.

18 MR. ANDERSON: You can have a standing
19 objection to everything you want.

20 MR. FREESE: Absolutely. You can have a
21 standing objection on relevancy.

22 MR. HUTCHINSON: Well, what I mean
23 standing objection on relevancy I'm talking about
24 admitting the exhibit for the limited purpose of

1 attacking his credibility.

2 MR. ANDERSON: Or trying to attack it.

3 MR. FREESE: You can have it.

4 BY MR. ANDERSON:

5 Q. How many pages of Ms. White's
6 medical record did the defense lawyer show you?

7 A. Nothing, just one page.

8 Q. How many medical records were in
9 Ms. White's --

10 A. Sometimes there are thousands of
11 pages.

12 Q. Did counsel in fairness provide you
13 with those medical records to take a look at?

14 A. No, he didn't.

15 Q. Did he -- he kept saying that you
16 gave opinion in this case, did he offer up your
17 testimony for you to take a look at?

18 A. No, he didn't.

19 Q. Doctor, he was -- during this part
20 of your questioning he was asked (sic) whether or
21 not TVT is made by Ethicon, do you recall that?

22 A. Yes, I do.

23 Q. In your review of the thousands of
24 pages of medical records across all mesh

1 manufacturers, have you noted that TVT can be used
2 interchangeably from one mesh manufacturer to
3 another.

4 MR. HUTCHINSON: Objection, leading.

5 THE DEPONENT: That's what I told him.

6 When I was answering his questions my first answer
7 was that TVT is a loose term used by clinicians.
8 It means just a sling.

9 BY MR. ANDERSON:

10 Q. What does "TVT" stand for?

11 A. Transvaginal tape.

12 Q. And was Ms. White implanted with a
13 Boston Scientific transvaginal tape?

14 A. Well, she was implanted with some
15 type of transvaginal tape.

16 Q. And was it retropubic?

17 A. Apparently it was retropubic, but I
18 would have to go through the records again to tell
19 you exactly.

20 Q. And did counsel allow you an
21 opportunity to look through and see where the list
22 -- the "Ethicon TVT retropubic" was in her
23 records?

24 A. No, he didn't.

1 Q. From all those reports that counsel
2 kept showing you one after another were there any
3 mixed up samples in any of that?

4 A. No.

5 Q. When you prepare a medical
6 chronology in your case-specific reports are you
7 simply transferring the patient's medical records
8 and what her doctors have said into your own
9 chronology?

10 A. Yes.

11 Q. When you're doing your research or
12 you're preparing the general portion of your
13 reports do you even care which mesh manufacturer
14 it is when you're trying to show the pathological
15 findings and the tissue changes that can relate in
16 a woman's tissue to mesh?

17 A. No.

18 Q. Why is that?

19 A. Because, as I said, they all behave
20 the same way. TVT slings and tapes are identical.
21 The only difference is AMS was making them out of
22 all clear fiber, Boston Scientific and Ethicon
23 slings are indistinguishable under microscope. I
24 wouldn't be able to tell you which one is which.

1 Q. The defendant for J&J -- the defense
2 counsel for J&J pointed out in this report,
3 Exhibit 15, rectal muscle and bladder muscle. Do
4 you have that in front of you?

5 A. Yes, I do.

6 Q. And do you see on page 58 where you
7 have listed there "rectal muscle"?

8 A. Yes.

9 Q. And 59, "bladder muscle" et cetera?

10 A. Yes, I do.

11 Q. If you turn back to your report on
12 page 17?

13 A. Yes.

14 Q. Do you recall during your testimony
15 you kept saying that there was a part of your
16 report that that all related to?

17 A. Yes.

18 Q. Did counsel give you an opportunity
19 to point that out to the jury?

20 A. No. After my repeated requests he
21 didn't give me that opportunity.

22 Q. I'll give you that opportunity now.
23 If you can look at page 17 please explain to the
24 jury what was going on with those images and how

1 you referred to it in your report?

2 A. All those images were provided to
3 support one paragraph on page 17 which has heading
4 "Involvement of Smooth Muscle of the Vaginal Wall,
5 Urinary Bladder, Urethra and Rectum". And then
6 the description is:

7 "In explanting transvaginal mesh
8 devices the smooth muscle of the pelvic
9 organs can become affected by the mesh.
10 Microphotographs in figure set 8 are
11 representative of the presence of
12 smooth muscle in explanted mesh
13 devices."

14 And then all of those images they all
15 show the same feature, presence of smooth muscle
16 within the mesh. Doesn't matter which organ.

17 Q. Okay. Let's shift gears for a
18 minute. During cross-exam counsel emphatically
19 asked you things that you don't do. You don't
20 implant mesh, right?

21 A. Yes.

22 Q. You don't explant mesh?

23 A. Yes.

24 Q. You're not an astronaut are you?

1 A. No.

2 MR. HUTCHINSON: Objection,
3 argumentative.

4 Counsel, counsel, withdraw that
5 question, please. Counsel, Ben, would you
6 withdraw the question please? It's argumentative.
7 Will you withdraw it?

8 MR. ANDERSON: No.

9 BY MR. ANDERSON:

10 Q. Let me ask you this, Dr. Iakovlev,
11 do urogynecologist typically look at pathology?

12 A. No.

13 Q. Do polymer scientists typically look
14 at pathology?

15 A. I hope not.

16 Q. So within different fields are there
17 different tools for each specialty to be able to
18 examine patients and to be able to examine samples
19 that come from patients?

20 A. That's correct.

21 Q. So despite the fact that you don't
22 do this long list, FTIR, SEM, tensile strength,
23 elongation and toughness, or bench-top testing, do
24 you need to do any of that in order to arrive at

1 pathological findings and to be able to express
2 your opinions that you've given here today?

3 MR. HUTCHINSON: Objection leading, also
4 form.

5 THE DEPONENT: No. None of that is
6 taught in pathology residency, and we're using
7 completely different tools and I'm trained in
8 completely different methods. None of the
9 pathologists have expertise in any of those
10 techniques.

11 MR. HUTCHINSON: Objection. Move to
12 strike as nonresponsive.

13 BY MR. ANDERSON:

14 Q. Do pathologists typically have an
15 expertise or experience in molecular weight, FTIR,
16 tensile strength, bench-top testing, elongation or
17 toughness testing?

18 A. I think none of the pathologists
19 anywhere in the world have knowledge of all those
20 techniques.

21 Q. And do pathologists around the
22 world, when they are looking at explanted meshes,
23 need FTIR, or tensile strength, or molecular
24 weight testing in order to arrive at

1 clinico-pathological correlations?

2 A. No, they don't.

3 Q. Counsel asked you questions as to
4 whether or not you ruled out vaginal infections,
5 pre-existing pelvic pain, pre-existing
6 dyspareunia, some metal in the Essure device, and
7 other exams that Ms. Ramirez had. Do you recall
8 that part of your questioning?

9 MR. HUTCHINSON: Objection, compound.
10 Also object to form and foundation.

11 BY MR. ANDERSON:

12 Q. Whatever. Go ahead, Doctor.

13 A. I do.

14 Q. Did any of the doctors for
15 Ms. Ramirez list as the reason for her 2010 or
16 2015 explants vaginal infections?

17 A. No.

18 Q. Did any of the doctors who explanted
19 her TVF Ethicon mesh in 2010 or 2015 list
20 pre-existing dyspareunia as the reason for it?

21 A. No.

22 Q. Did any of them list the Essure
23 device or some sort of metallic foreign body
24 reaction as the reason that they explanted her TVT

1 sling in 2010 or 2015?

2 A. No, they explanted TVT sling.

3 Q. Do you need to know the name of the
4 doctor who explanted the TVT-O device, or who
5 implanted the TVT-O device, in order to arrive at
6 pathological conclusions and to give the jury
7 opinions on what you see on the microscopic
8 slides?

9 A. No, I don't need it.

10 Q. Do you need to know the name of your
11 technician in your path lab who may have processed
12 the slides in order to offer opinions as an expert
13 in the field of pathology for the jury here today?

14 A. No, I don't need it.

15 Q. Can you put up Exhibit 4(C)?
16 Doctor, showing you the -- Doctor, redirecting you
17 back to the part of your testimony where you were
18 talking about Ms. Ramirez's slides here, and the
19 S100 staining on the left showing the nerve
20 entrapment and the scarring on the right. Do you
21 recall that part of your testimony?

22 A. I do.

23 Q. Do you need to count the nerve
24 density in order to make the opinions that you do

1 regarding entrapped nerves causing pain and scar
2 tissue leading to pain?

3 MR. HUTCHINSON: Objection, foundation.

4 THE DEPONENT: No, I don't need and I
5 told it to the defense counsel.

6 MR. HUTCHINSON: Move to strike as
7 unresponsive.

8 BY MR. ANDERSON:

9 Q. Do you need to consult with a
10 neuropathologist or any of her treating -- Ms.
11 Ramirez's treating doctors in order to make a
12 determination and have an opinions regarding those
13 slides?

14 A. No. I don't need to consult
15 neuropathologist -- and I don't think that
16 neuropathologist would argue that they're not
17 nerves. They are nerves.

18 MR. HUTCHINSON: Move to strike as
19 nonresponsive.

20 BY MR. ANDERSON:

21 Q. Do you need, what did defense
22 counsel say? Nociceptors and PGP9.5 in order to
23 be able to make the opinions you do about the
24 images that the jury is seeing there with regard

1 to the explants from Ms. Ramirez's body?

2 A. No. I could see these nerves even
3 on H&E. I didn't even need to do S100.

4 MR. HUTCHINSON: Move to strike as
5 nonresponsive.

6 BY MR. ANDERSON:

7 Q. Did you need to see this -- explain
8 what you mean by the last statement.

9 MR. HUTCHINSON: Also object to the
10 form.

11 THE DEPONENT: I can see the nerves in
12 H&E stain. And S100 was done more for
13 demonstration, for other people to be able to see
14 them easier, for those who are not pathologists.

15 BY MR. ANDERSON:

16 Q. Is the lack of dead tissue or
17 necrosis significant to your opinions at all in
18 this case?

19 A. No, I don't think I barely ever
20 describe necrosis in mesh specimens.

21 Q. Do you need a neuroma in a pathology
22 slide in order to diagnose whether an entrapped
23 nerve can cause pain?

24 A. No. I mean, I know that it can

1 happen. And we can see nerves here right there on
2 the screen.

3 Q. Counsel went to great lengths to
4 talk about formalin, alcohol, xylene, he said
5 toluene, it's toluene. Do you remember the
6 questions about that?

7 A. Yes, I do.

8 MR. HUTCHINSON: Objection,
9 argumentative. Counsel, did you hear my
10 objection?

11 MR. ANDERSON: What did you say?

12 MR. HUTCHINSON: I said objection,
13 argumentative.

14 BY MR. ANDERSON:

15 Q. That's fine.

16 In terms of counsel's questions
17 regarding the process of slides, he listed
18 formalin, alcohol, xylene and toluene as things
19 that are treated -- as chemicals that are used to
20 treat specimens in order to put them on the
21 slides. Do you recall that?

22 A. I do.

23 Q. Is that process of using formalin,
24 alcohol, xylene and toluene used every day

1 around the world to process pathological slides?

2 A. Yes. And it is the same process and
3 it's been used for decades, for a hundred years.

4 Q. And over those hundred years, or
5 actually let's just take the last 30, has any
6 scientific literature, or have you noticed from
7 your own examination of explants that alcohol,
8 xylene, toluene, or any other treatment of the
9 sample before it's put on the slide, has any
10 effect in causing you to be able to -- whether you
11 can render opinions as to whether or not the mesh
12 has certain tissue reaction in the woman's tissue?

13 MR. HUTCHINSON: Objection, foundation.

14 THE DEPONENT: It was a long question.
15 Can you repeat it?

16 MR. HUTCHINSON: Ben, can you rephrase
17 that question for us please.

18 MR. ANDERSON: I'm going to.

19 BY MR. ANDERSON:

20 Q. In the hundreds of slides -- strike
21 that.

22 In the hundreds of explants that you've
23 examined for purposes of your scientific work, and
24 in the context of litigation, has the use of the

1 standards of formalin, alcohol, xylene or
2 toluene ever impacted your ability to offer
3 opinions and to do a pathological analysis
4 regarding what you see in the slides?

5 MR. HUTCHINSON: Objection, foundation.

6 THE DEPONENT: No. As I said, it's a
7 standard technique used in all labs around the
8 world in North America. That's how we do it.

9 BY MR. ANDERSON:

10 Q. Have you ever seen any of the
11 scientific literature regarding the analysis of
12 explanted meshes that formalin, alcohol, xylene or
13 toluene have impacted a pathologist's ability to
14 analyze explanted pathological tissue?

15 A. No.

16 Q. I mean, that's the only way to do it
17 to use all those chemicals.

18 MR. HUTCHINSON: Move to strike as
19 nonresponsive.

20 BY MR. ANDERSON:

21 Q. You were shown the pathology report
22 from University of Texas Southwestern from March
23 10, 2015, by counsel. Do you recall that?

24 A. I do.

1 Q. And he said they don't list
2 degradation do they? Do you remember that?

3 A. Yes, I do.

4 Q. Do you know if the pathologist was
5 asked to determine whether or not there was
6 degradation?

7 MR. HUTCHINSON: Objection, foundation,
8 also calls for speculation.

9 THE DEPONENT: What I see -- what I saw
10 in the report the only question he was asked to
11 confirm if there is mesh or not.

12 BY MR. ANDERSON:

13 Q. Did counsel provide you with any
14 evidence that there was any question by the
15 surgeon asking the pathologist there to tell him
16 whether or not there was degradation of the mesh?
17 Did he provide you any evidence of that?

18 A. No.

19 Q. Did he provide you any evidence that
20 the surgeon asked the pathologist to tell him
21 whether or not there was bridging fibrosis or scar
22 plating?

23 A. No.

24 MR. HUTCHINSON: I'm sorry, our iPad has

1 stopped.

2 THE VIDEOGRAPHER: Going off the record
3 at 5:52 p.m.

4 --- Break taken.

5 THE VIDEOGRAPHER: Back on the record at
6 5:53 p.m.

7 BY MR. ANDERSON:

8 Q. Did counsel provide you any evidence
9 that the surgeon at University of Texas Southwest
10 Hospital asked for any information other than that
11 which was given in his pathology report?

12 A. No.

13 Q. Did counsel provide you with any
14 evidence as to whether or not the pathologist at
15 UT Southwestern is even aware of the pathological
16 change in the tissue related to mesh that can lead
17 to degradation, fibrotic bridging or scar plating?
18 Did he provide you any evidence of that?

19 A. No.

20 Q. Do we have any idea what the level
21 of knowledge or the scientific background is of
22 the pathologist who looked at Ms. Ramirez's
23 explant?

24 A. We don't.

1 MR. HUTCHINSON: Ben, I'm going to
2 object to your last question as pure speculation.

3 MR. ANDERSON: I wish you would.

4 MR. HUTCHINSON: Thank you.

5 MR. ANDERSON: Sure.

6 BY MR. ANDERSON:

7 Q. Counsel asked you a long series of
8 questions about negatively charged ions,
9 positively charged ions, hydrostatic, soluble and
10 all things like that. Do you remember that part
11 of your question?

12 A. I do.

13 Q. Are any of those features important
14 or significant to you as a pathologist in being
15 able to stain mesh explants, and to offer opinions
16 regarding what those tissue changes are on the
17 microscopic slide?

18 MR. HUTCHINSON: Objection, compound
19 question.

20 THE DEPONENT: No, doesn't matter how it
21 stains. The fact that it stains it allows me to
22 see it under microscope that's what's important.
23 Exact mechanism doesn't matter. And for many dyes
24 we don't even know exact mechanism.

1 BY MR. ANDERSON:

2 Q. How many different types of dyes or
3 staining have been used between you, other
4 pathological researchers, as well as Ethicon's own
5 internal pathologists in order to look at bark --
6 or in order to determine whether or not -- let me
7 ask a better question.

8 How many different types of staining
9 have been used between yourself and the
10 researchers at Ethicon, based upon the internal
11 studies that you saw with regard to being able to
12 stain explanted mesh in order to see if there was
13 in vivo degradation?

14 A. At least six.

15 Q. What are those different six stains?

16 A. Hematoxylin eosin stains it, red
17 counterstain for von Kossa stains it, trichromes,
18 both masson trichrome and other trichromes stain
19 it, counterstain for immunostains stain it,
20 phloxine stains it and stained it when they used
21 in Ethicon, and I'm sure that any other stain will
22 stain in.

23 Q. Have you been shown by counsel any
24 internal Ethicon documents by their scientists,

1 not their experts in litigation but by their
2 scientists, indicating they had trouble
3 determining whether or not there was in vivo
4 degradation of their Prolene sutures because they
5 couldn't dye it properly or stain it properly?

6 MR. HUTCHINSON: Objection,
7 argumentative.

8 BY MR. ANDERSON:

9 Q. Seen any reports by them?

10 MR. HUTCHINSON: Same objection.

11 THE DEPONENT: No. They used phloxine
12 and it readily stained the degraded layer.

13 BY MR. ANDERSON:

14 Q. I'm going to direct your attention
15 back to Exhibit 20, which was your publication,
16 Degradation of Polypropylene In Vivo. Do you
17 remember counsel asked you some questions about
18 that?

19 A. Yes, I do.

20 Q. Do you remember out of these 1, 2,
21 3, 4, oh, 12 or 15 page report remember him
22 pulling out two sentence for you to look at?

23 A. I do.

24 Q. And let's look at the two sentences.

1 Under the abstract, "The fundamental question as
2 to whether polypropylene degrades in vivo is still
3 debated." Do you remember that?

4 A. I do.

5 Q. And then, "The causes and mechanisms
6 of complications associated with the mesh remain
7 incompletely understood." Do you see that?

8 A. Yes, I do.

9 Q. What did that mean in the context of
10 your study?

11 A. It means that although there were
12 studies showing it there were attempts to
13 discredit those studies.

14 Q. Okay.

15 A. And I used different method to show
16 again the same feature, but using histological
17 methods, which shows some other features of
18 degradation which were not shown before, but they
19 show exactly is the same mechanism in the hope
20 that finally, after this, maybe everybody will
21 agree that it does degrade. I mean there will be
22 no further attempts to dispute those findings.

23 Q. And if in fact there is a debate do
24 you recall the slides that we put up with all of

1 the various authors, and I showed you all of the
2 various scientific literature regarding
3 polypropylene degradation. Do you recall that?

4 A. I do.

5 MR. HUTCHINSON: Objection. Foundation.

6 BY MR. ANDERSON:

7 Q. Any question in your mind that there
8 was any debate by those scientists as to whether
9 or not polypropylene degrades in the body?

10 A. No.

11 MR. HUTCHINSON: Objection, also
12 speculation.

13 BY MR. ANDERSON:

14 Q. Go ahead.

15 A. It was mostly from a small group of
16 people who were questioning the findings, but I
17 did not see actually studies by them showing that
18 it is not degraded polypropylene. The only thing
19 they did they questioned the results of those
20 studies but they never proved that it's not
21 polypropylene.

22 Q. And was this Exhibit 20 actually a
23 study rather than just a criticism of other
24 people's studies?

1 A. Yes, it is study.

2 Q. And what were the results of this
3 study regarding in vivo degradation of meshes
4 explanted from patients?

5 A. This study was based on 183
6 specimens, as I remember. And it showed that in
7 all except one or two I believe the degradation
8 bark was detectable by histology. The only time,
9 or in one or two sample it was not detectable
10 because the explants were taken out of the body
11 too early. The bark was too thin to be visible.

12 Q. Counsel also showed you Exhibit 8,
13 that's the Celine Mary article.

14 A. Yes.

15 Q. And he pulled one sentence out of
16 this study regarding the degradation of Prolene
17 sutures. Do you recall that?

18 MR. HUTCHINSON: Objection,
19 argumentative.

20 THE DEPONENT: I do.

21 BY MR. ANDERSON:

22 Q. And that one sentence on that first
23 page it says, "It has high flexibility and tensile
24 strength and exhibits low thrombogenicity and

1 tissue reaction." Do you recall that?

2 A. I do.

3 Q. This article was written in 1998?

4 A. Yes.

5 Q. Had transvaginal meshes even gone on
6 the market by 1998?

7 A. No, I don't think so.

8 Q. And has the marketing and sales of
9 transvaginal meshes been from 1998 to the present?

10 A. Yes.

11 Q. Okay.

12 A. Within that timeframe.

13 Q. And have -- based upon your review
14 of the literature have you noted whether or not
15 complications have been reported or not reported
16 over those last 18 years?

17 A. They have been reported over those
18 years.

19 Q. And what was the conclusion on page
20 205 from the study? Let me take you down under
21 the last part of that paragraph. Beginning with
22 the word "visual evidence" what does that say?

23 A. "Visual evidence of surface
24 degradation was observed after one and

1 two years for the polypropylene but not
2 the PVDF sutures. This stress cracking
3 phenomenon is believed to be associated
4 with distinct, two-phase structure of
5 oriented polypropylene monofilaments."

6 Q. So what does that collusion mean
7 to -- in laypeople's terms?

8 A. It means that polypropylene degrade,
9 PVDF didn't degrade.

10 Q. Counsel also pointed out the Leibert
11 article from 1976 and asked you some questions
12 about that. Do you recall that?

13 MR. HUTCHINSON: Excuse me,
14 mischaracterized the testimony. Counsel, I didn't
15 point that article out you did.

16 BY MR. ANDERSON:

17 Q. In your questioning you did.

18 A. Yes, I remember that.

19 Q. Just turn back to page 950 where
20 counsel was pointing out some of the conclusions.
21 You see that?

22 A. Yes, I do.

23 Q. Do you see photograph 4.

24 A. Number 4?

1 Q. Do you see that?

2 A. Yes, I do.

3 Q. Where it says that the filaments
4 were analyzed 30 days after implant and up to 150
5 days? Do you see that?

6 A. I do.

7 Q. So between a month and five months.
8 Do you see that?

9 MR. HUTCHINSON: Objection, leading.

10 MR. ANDERSON: I'm directing him to a
11 part of the literature. Cheese and crow.

12 BY MR. ANDERSON:

13 Q. Do you see that?

14 A. Yes, I do.

15 Q. What was degradation -- strike that.
16 Based upon the research that you've done
17 in your analysis of over 300 explanted meshes,
18 when does degradation become visible after it's
19 been explanted -- implanted the human body?

20 MR. HUTCHINSON: Objection, foundation.

21 THE DEPONENT: About a year.

22 BY MR. ANDERSON:

23 Q. And this study didn't go out to a
24 year did it?

1 A. No, it didn't.

2 Q. It didn't go beyond five months did
3 it?

4 MR. HUTCHINSON: Objection, leading.

5 BY MR. ANDERSON:

6 Q. Did it go beyond five months?

7 A. No, it didn't.

8 Q. Doctor, you were asked a number of
9 questions by defense counsel as to whether or not
10 you've ever met Ms. Ramirez. Do you remember
11 that?

12 A. I do.

13 Q. How often do pathologists ever meet
14 the patients for the pathological specimens that
15 they're looking at?

16 A. Practically never, I mean unless
17 it's an autopsy case.

18 Q. How many pathological specimens do
19 you analyze on an annual basis?

20 A. Sometimes up to 5,000.

21 Q. Five thousand. Would you be able to
22 review five thousand of those if you had to meet
23 all the patients?

24 A. No.

1 Q. How often do pathologists examine
2 patients in a clinical setting when they are
3 looking at their pathology in order to determine
4 what the tissue reactions may be in her body?

5 A. Very rarely. Almost never.

6 Q. Counsel showed you some comics or
7 animations, graphics of a pelvis and wanted you
8 point out for the jury where Ms. Ramirez had pain.
9 Do you remember that?

10 MR. HUTCHINSON: Objection,
11 argumentative.

12 THE DEPONENT: I do.

13 BY MR. ANDERSON:

14 Q. In forming your opinions as to
15 whether or not the pathological changes in
16 Ms. Ramirez's tissue correlated to the symptoms of
17 pain in her records, did you rely on animations or
18 did you rely on something else?

19 A. Well, I relied on real clinical
20 history, real records and real specimen.

21 Q. Did you feel the need to go to
22 Google and look up any animations of the human
23 pelvis?

24 A. No.

1 MR. HUTCHINSON: Objection,
2 argumentative.

3 BY MR. ANDERSON:

4 Q. Did you need to know where the pain
5 was in her vagina in order to come to the opinions
6 and conclusions that you've offered in this case?

7 A. No, not exactly because it was
8 clinical part, clinical differential diagnosis.
9 They found where the pain is, they excised the
10 sling. That was their decision after examination
11 of the patient.

12 Q. Okay. And I'm glad you brought that
13 up. We showed the jury earlier your diagram where
14 you had the -- the urethra and the sling was
15 underneath it, do you recall that?

16 A. I do.

17 Q. And what was the purpose of showing
18 that to the jury?

19 A. Just to show the relationship where
20 the sling is and where the urethra is.

21 Q. Okay. In the 1983 and 1984 internal
22 Ethicon Microcrack Prolene Committee studies that
23 you looked at are the cracks that were exhibited
24 in those images caused by the drying?

1 A. It's distracting.

2 Q. Did you hear my question?

3 A. Can you repeat it, because it's
4 distracting when you flip the page

5 Q. Can you read it back please?

6 THE COURT REPORTER: In the 1983 and
7 1984 internal Ethicon Microcrack polypropylene
8 committee studies that you looked at, are the
9 cracks that were exhibited in those images caused
10 by the drying?

11 THE DEPONENT: No.

12 BY MR. ANDERSON:

13 Q. Okay, explain.

14 A. It was easier to see in the dry
15 fiber because when it was wet water would be
16 filling the cracks and it would be harder to see
17 it. But their final conclusion was that it's not
18 the drying which is causing the cracks.

19 Q. Can you pull out Exhibit 1 please.
20 That would be your general and case-specific
21 report for the case that we're actually here for
22 today, Ms. Ramirez.

23 A. Yes.

24 Q. Did counsel for Ethicon show you a

1 single slide in the Ramirez report that changes
2 your opinions in any way?

3 A. No.

4 Q. Was every slide that was labelled
5 JR(1) through (19) in the Ramirez report actual
6 tissue and mesh samples explanted from
7 Ms. Ramirez?

8 A. Yes.

9 Q. Did counsel show you a single slide
10 in Ms. Ramirez's report that was explanted from a
11 woman other than Ms. Ramirez?

12 A. No.

13 Q. Did counsel show you a single slide
14 in the Ramirez report that was mislabelled?

15 A. No.

16 Q. In the general report did you state
17 that any of those slides were Ms. Ramirez's?

18 A. No.

19 Q. Let's go to page 20 in the general
20 report. On page 20?

21 A. Yes.

22 Q. Did you state on this that this
23 slide was related to Ms. Ramirez?

24 A. No.

1 Q. And on figure 21 what does that say
2 under the figure there?

3 A. Examples of foreign body
4 inflammatory reaction.

5 Q. Did you state in this report that
6 that was Ms. Ramirez?

7 A. No.

8 Q. Look at page 22. Did you state
9 anywhere on here that this was from Ms. Ramirez's
10 body?

11 A. No, I didn't.

12 Q. And why not?

13 A. Because it's a general part. I
14 compile it from different patients from different
15 manufacturers to show histological features. This
16 is not the case specific part.

17 Q. Okay. And in the general report on
18 page 23 did you indicate that any of those images
19 were from Ms. Ramirez?

20 A. No.

21 Q. And page 24, what does it say under
22 the figure there?

23 A. "Example of scar encapsulation".

24 Q. Did you state that that was

1 Ms. Ramirez's sample?

2 A. No.

3 Q. Is it accurate that these are
4 examples of scar encapsulation?

5 A. Yes, it is accurate.

6 Q. And on 25 is it accurate this is an
7 example of scar ingrowth?

8 A. Yes, it is.

9 Q. And did you state on here that this
10 was Ms. Ramirez's in any way?

11 A. No.

12 Q. On page 26 where it's showing nerve
13 branches, did you state that any of these were
14 Ms. Ramirez's?

15 A. No, I did not state.

16 Q. And is this an accurate depiction of
17 nerves embedded in scar tissue?

18 A. It is.

19 Q. And on page 27 did you state
20 anywhere here that this was Ms. Ramirez's?

21 A. No.

22 Q. And what do you state underneath the
23 figures?

24 A. "Examples of nerve ingrowth."

1 Q. And are those accurate that those
2 are examples of never ingrowth?

3 A. It is accurate.

4 Q. And on page 29?

5 A. Yes.

6 Q. What does it say underneath where it
7 says figure 4(B)?

8 A. "Examples of nerve ingrowth."

9 Q. Does it say that that's
10 Ms. Ramirez's?

11 A. No.

12 Q. Is that an accurate depiction of
13 nerve ingrowth seen by S100 stain?

14 A. It is.

15 Q. On page 31 what does it say under
16 the diagrams?

17 A. "Examples of vascular dilatation and
18 edema within mesh compartments."

19 Q. Is that an accurate example of
20 vascular dilatation and edema within mesh
21 compartments?

22 A. It is.

23 Q. And did you state anywhere that that
24 is Ms. Ramirez's?

1 A. No.

2 Q. Page 32, do you see that?

3 A. Yes.

4 Q. Did you state anywhere that that was
5 Ms. Ramirez's?

6 A. No.

7 Q. What does it say underneath the
8 image?

9 A. "Examples of vascular thrombosis
10 within mesh compartments."

11 Q. And does it accurately depict
12 examples of vascular thrombosis within mesh
13 compartments?

14 A. It is.

15 Q. And did counsel for the defense
16 point out any of these images to you on your
17 cross-examination shows where you said that these
18 are just examples of these type of features?

19 MR. HUTCHINSON: Object to the form.
20 I'm also going to object to the extent that it
21 mischaracterizes the testimony. I asked him about
22 page 20 where he says all photographs are
23 explanted Ethicon --

24 MR. FREESE: That was your cross,

1 counsel.

2 MR. ANDERSON: That's your cross. Cross
3 part 2. This is my part.

4 THE DEPONENT: He did not.

5 BY MR. ANDERSON:

6 Q. Thank you. Again on page 35 and 36
7 what do you list under those images?

8 A. "An example of blue granules
9 retained in the degradation layer."

10 Q. Counsel didn't point those out for
11 the jury, did he, on your cross-examination that
12 you just said these were examples?

13 MR. HUTCHINSON: Objection, leading.

14 BY MR. ANDERSON:

15 Q. Did counsel for the defense on the
16 cross-examination allow you to tell the jury that?

17 A. No, he didn't.

18 Q. On cross-examination did counsel
19 show you anything in your images or in the text of
20 your report that was inaccurate in any way?

21 A. No.

22 Q. Do you stand by all of your opinions
23 that you've given here today and all the opinions
24 that you've expressed in this report?

1 A. I do.

2 MR. ANDERSON: We will offer all of our
3 exhibits into evidence and fight about the
4 admissibility later on at this time. Otherwise
5 I'm done for right now.

6 MR. HUTCHINSON: We may have a re-cross.
7 Give us just a minute.

8 THE VIDEOGRAPHER: Going off the record
9 at 6:15 p.m.

10 --- Whereupon the examination was
11 completed at 6:15 p.m.

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REPORTER'S CERTIFICATE

I, HELEN MARTINEAU, CSR, Certified
Shorthand Reporter, certify;

That the foregoing proceedings were
taken before me at the time and place therein set
forth at which time the witness was put under oath
by me;

That the testimony of the witness and
all objections made at the time of the examination
were recorded stenographically by me and were
thereafter transcribed;

That the foregoing is a true and
accurate transcript of my shorthand notes so
taken.

PER: HELEN MARTINEAU

CERTIFIED SHORTHAND REPORTER

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ACKNOWLEDGMENT OF DEPONENT

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I, _____, do

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hereby certify that I have read the

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foregoing pages, and that the same is

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a correct transcription of the answers

8

given by me to the questions therein

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propounded, except for the corrections or

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changes in form or substance, if any,

11

noted in the attached Errata Sheet.

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VLADIMIR IAKOVLEV, MD

DATE

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Subscribed and sworn

to before me this

19

_____ day of _____, 20____.

20

My commission expires:_____

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Notary Public

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24